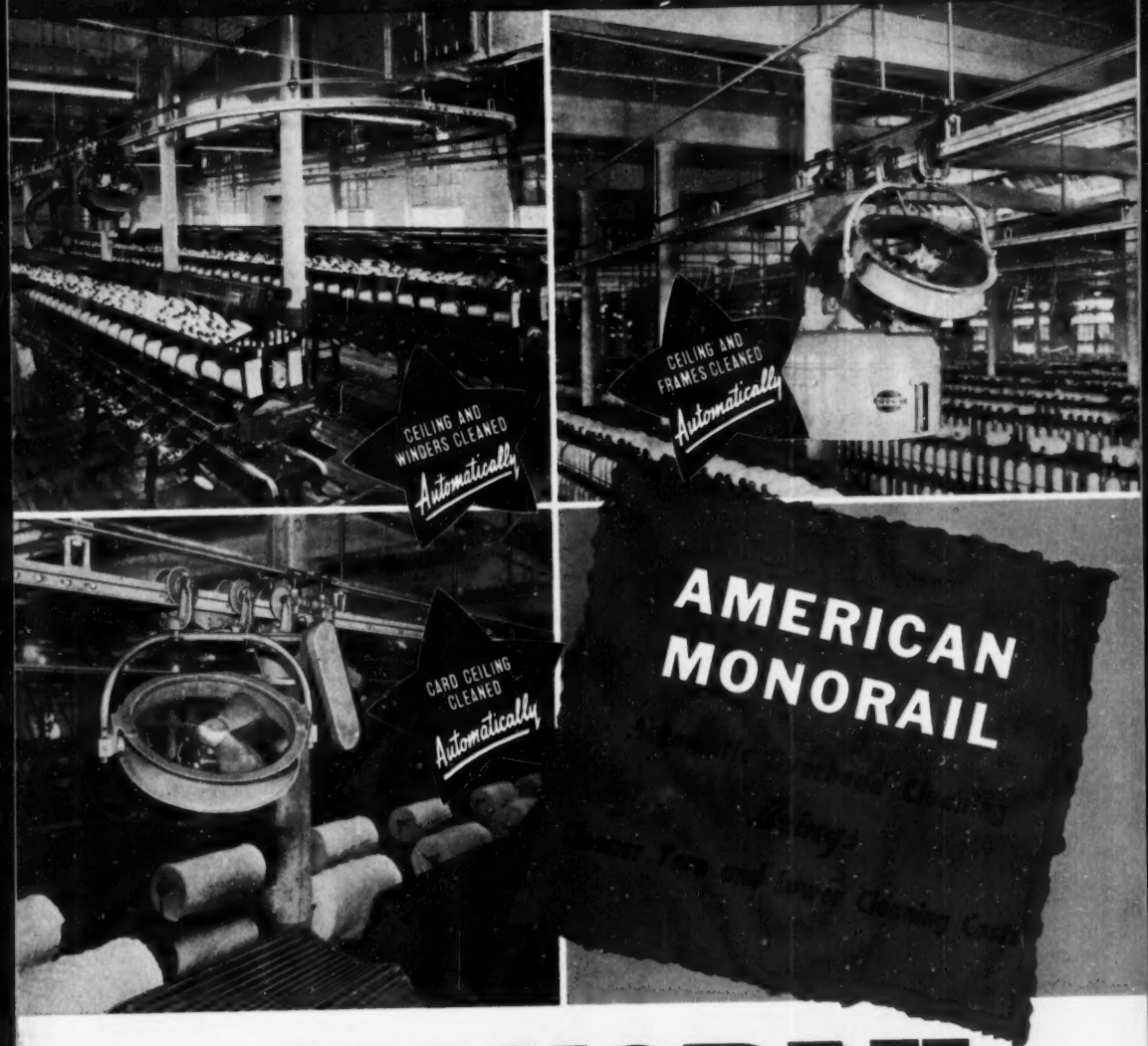
FEBRUARY, 1961

Textile Industries

COTTON
Textile Industries


CEILING AND WINDERS CLEANED Automatically
CEILING AND FRAMES CLEANED Automatically
CARD CEILING CLEANED Automatically
AMERICAN MONORAIL

THE AMERICAN MONORAIL COMPANY
13106 ATHENS AVENUE CLEVELAND 7, OHIO

Commercial

FACTORING

More and more, the word "COMMERCIAL" is recognized as the "distinguishing mark" in factoring. It is the symbol of long experience, complete facilities and resources, and a knowledge of every branch of the textile industry.

We will gladly explain in detail what *COMMERCIAL FACTORING* can mean to your business in new opportunities and increased profits.

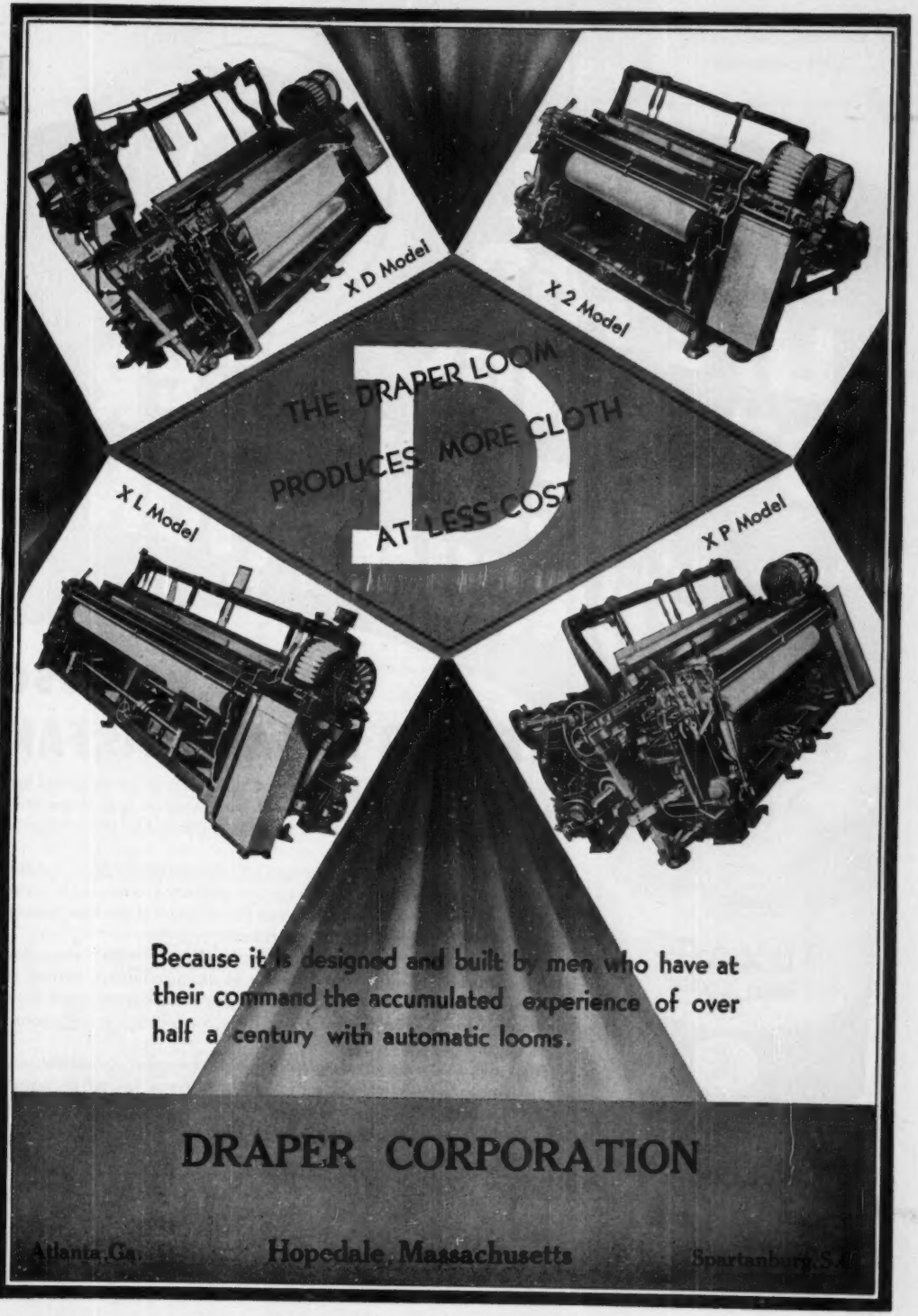
COMMERCIAL FACTORS CORPORATION

Fred'k Victor & Achelis, Inc. Established 1828
Schafer, Schramm & Vogel Established 1836
Poiorls, Buhler & Co., Inc. Established 1893

TWO PARK AVENUE, NEW YORK 16

EUGENE G. LYNCH, 80 FEDERAL STREET, BOSTON 10, MASS.
T. HOLT HAYWOOD, WINSTON-SALEM, NORTH CAROLINA

TEXTILE INDUSTRIES is published monthly at 116 E. Crawford St., Dalton, Ga., by W. R. C. Smith Publishing Company, Dalton and Atlanta, Ga., U. S. A. Executive and Editorial Offices: 806 Peachtree St., Atlanta 5, Ga.
Subscription Rates, United States and Possessions, $2.00 for one year; Canada, South America, Central America, $2.00 per year. Foreign Countries, $5.00 per year. Entered as second-class matter at the post office, Dalton, Georgia, under the Act of March 3, 1879.
Volume 115 Number 2

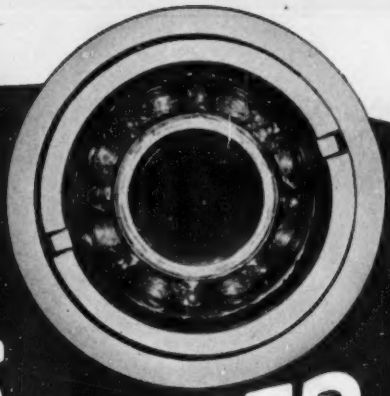


Because it is designed and built by men who have at their command the accumulated experience of over half a century with automatic looms.

DRAPER CORPORATION

Atlanta, Ga. Hopedale, Massachusetts Spartanburg, S. C.

LONGER LIFE FOR BEARINGS ... LESS POWER CONSUMPTION



when you use TEXACO REGAL STARFAK

When *Texaco Regal Starfak* goes into your high-speed, grease-lubricated ball and roller bearings, you can count on savings all along the line—longer bearing life, lower maintenance costs, less power consumption, less lubrication expense.

Texaco Regal Starfak is a premium-quality lubricant much higher in resistance to oxidation, separation and leakage than ordinary greases; and it retains stability in storage as well as in use. *Texaco Regal Starfak* is also heat resistant and can be used at high operating temperatures.

Desirable power savings spring from *Texaco Regal Starfak's* always-low starting and running torques; and absence of excessive internal friction assures cool running bearings. Application by gun or hand is easy—and fewer applications are necessary because *Texaco Regal Starfak* stays in the bearings, gives longer-lasting protection.

Enjoy the cost-saving advantages of Texaco lubrication throughout your mill. A Texaco Lubrication Engineer will gladly help you. Just call the nearest of the more than 2,000 Texaco Distributing Plants in the 48 States, or write The Texas Company, 135 East 42nd Street, New York 17, N. Y.

TEXACO

TEXACO Lubricants

FOR THE TEXTILE INDUSTRY

TUNE IN . . . TEXACO presents MILTON BERLE on television every Tuesday night. METROPOLITAN OPERA radio broadcasts every Saturday afternoon.

Textile Industries

Volume 115, Number 2
February, 1951

This Issue: Modern Production Methods

CASE		PAGE
1	Smoother Loom Operation with Flywheel Motors	105
2	15% Less Variation at Drawing	106
3	Knitted Fabrics Uniformly Dyed	107
4	Overhead Conveyor Nullifies Distance Between Departments	108
5	Spinning Speeds Easily Changed	109
6	Continuous Yarn Dyeing and Sizing	110
7	Vacuum Stripping Unit Cuts Down-Time in Woolen Card Room	111
8	Storage Facilities Conserve Space	112
9	Quill Stripping Operation Improves	112
10	Specially Treated Nylon Hosiery Absorbs Water More Rapidly	113
11	Metallized Sand Rolls Cut Supply Costs	114
12	New Winder Packages Have Customer Appeal	115
13	Reconditioned Spindles, Flyers Save Money	115
14	Hydraulic Divider for Drawing Rolls	116
15	Dye Kettle Cleaning Costs Decreased	116
16	Yarn Handling Unit for Spooler	117
17	Moisture Controls on Tenter Frames	118
18	Oilers Simplify Comb Box Lubrication	118
19	Accurate Cloth Measurement Saves Mill $16,000 Annually	119
20	Clock Spring Top Motion for Looms	119
21	Pneumatic Rack Control for Pickers	120
22	Wool Cloth Shearer Does Job of Three	121
23	Self-Cleaning Roving Box Also Safe	121
24	Sealed Floors Promote Cleanliness	122
25	Selvage Trimmer Saves Time	122
26	Rayon Quiller Attachment Loads Bobbins Directly onto Pinboards	123
27	Color-Eye Aids Dyers	124
28	30% More Production with Improved Knitters	124
29	Overhead Loom Beams	125
30	Graphite Remover for Nylon Laces Saves 50%	125
31	Improved Spinning Frame Lubrication	126
32	Mechanical Sweeper Lowers Cleaning Costs	127
33	Modernized Slashers Make Better Warp	127
34	Spot Humidification in Woolen Mill	128
35	Instrument Controls Acid Make-Up	128
36	Steam Cleaning Helps in Rebuilding Looms	129
37	Knit Goods Handling Costs Decreased	130
38	Preformed Strips Easily Installed	131
39	Less Trouble with Pad-Mounted Machines	131
40	Self-Cleaning Tank Screens	132
41	Revamped Opening Lines Solve Overload Problem	132
42	Centralized Line Shaft Lubrication	133
43	Pulley Drive on Spinning Spindles Saves 10% Labor; 50% Parts	134
44	Wet Floor Scrubbing Machine Saves Labor	134
45	Chemical Spray Cleans Looms	135
46	Circular Knitters for Argyle Socks	136
47	Conveyor Saves Mill $8,000 Yearly	136
48	Size Viscosity Controls	139
49	Device Lowers Peralta Maintenance Costs	139
50	More Effective Cloth Inspection	143
51	Tension Meter Helpful with Synthetic Yarns	145
52	Gun Speeds Wool Spinning Frame Lubrication	145
53	Loom Beam Handling with Gantry Type Device	147
54	Ceiling Cleaner Investment Amortized	149
55	Magazine Creel Affords 30% Saving	149
56	Modernize Extractor with Fluid Drive	151
57	Fork Trucks Cut Finishing Plant Costs	151
58	Nylon Bolsters Minimize Sludge Formation	152
59	Loom Cleaning Costs Reduced	152
60	Slasher Moisture Controls Eliminate Overtime	155
61	Card Mote Door Saves Time	155
62	Alignment Jigs Switched to Allow Double Spreading	155
63	Spinning Ring Lubrication Improved	157
64	Steam-Regulating Controls Improve Slashing	159
65	Single Instrument Records Dewpoint at Five Locations in Mill	161
66	Radiant Burners Improve Drying Operation	161
67	New Humidifiers Give Good Results	163
68	Overhead Cleaners Decrease Bad Work	163
69	Warp Spinning Improves with Paper Tubes	167
70	Warp Yarn Waste Minimized with Special Tape	167
71	Machine Cleaning Simplified	167
72	Improved Yarn Quality Attributed to Ball Bearing Top Rolls	169
73	Small Cone Winder Useful in Seamless Plant	170
74	Fewer Fires, More Production with Single Cylinder Waste Machine	170
75	Small Boiler Solves Steam Supply Problem	170
76	Vacuum Cleaner System in Weave Room	173
77	Conical Rings Aid Nylon Spinning	173
78	Hosiery Mill Matches Colors Accurately	175
79	Underframe Cleaners Do Better Job	177
80	Flat Belt Loom Drive	177
	Starch Handling at Pineville	179
	Measuring Table Aid Speeds Hosiery Matching	183

Space limitations on this page preclude the listing of the regular departments. None has been omitted; they will be found in their customary locations in the magazine.

Maynard L. Durham
Business Manager
Business Representatives

Boston—ARTHUR C. SHAW, 11 Monroe Rd., Wellesley Hills, Mass. (Phone: Wellesley 5-3648).
New York—WILLIAM K. HOFFMAN, 58 Euclid Ave., Maplewood, N. J. (Phone: South Orange 2-2484).
Chicago—L. E. ALLEN, Room 801, Security Bldg., 189 West Madison St., Chicago 2, Ill. (Phone: Andover 3-5469).
Cleveland—A. E. C. SMITH, 609 Caxton Bldg., Cleveland 15, Ohio (Phone: Cherry 1-7852).
Pittsburgh—Buffalo Area, J. D. PARSONS, 185 Jerusalem Rd., Cohasset, Mass. (Phone: 4-0159).
Charlotte—W. A. MCGEE, Box 562, Charlotte, N. C. (3-4932).
Gastonia—W. CLIFF RUTLAND, Box 102, Gastonia, N. C. (7995).
Los Angeles—L. B. CHAPPELL, Auditorium Bldg., 427 W. 5th St., Los Angeles, Calif. (Michigan 9849).
Philadelphia—RODMAN HANSON, 708 Hendren St., Philadelphia 28, Pa. (Ivy Ridge 3-4176).

John C. Fonville
Editor

ASSOCIATES

J. Frank Guest — Hunter Hughes, P. O. Box 968, Rock Hill, S. C.
Milton C. May — Paul M. Platzman, 22 Ridge Drive East, Flower Hill, Roslyn, N. Y.
H. B. Anderson

CONSULTING EDITORS

F. Gordon Cobb
Ben H. Crawford
J. A. Moody

Production Manager

[Copyright, 1951, by W. R. C. Smith Publishing Co.]

Published Monthly at 115 E. Gordon
Dalton, Ga.

By W. R. C. SMITH PUB. CO.

Editorial and Executive Offices
806 Peachtree St., N.E., Atlanta 5, Ga.
Telephone: Atwood 4462

ANNUAL SUBSCRIPTION
U. S., CANADA, PAN-AMERICA—$2.00
FOREIGN—$5.00

Other Smith Publications

ELECTRICAL SOUTH
SOUTHERN HARDWARE
SOUTHERN AUTOMOTIVE JOURNAL
SOUTHERN POWER AND INDUSTRY
SOUTHERN BUILDING SUPPLIES

W. J. ROOKS, *Pres.*; R. P. SMITH, *Exec. V. P.*; T. W. MCALLISTER, *V. P.*; R. W. O'BRIEN, *V. P.*; A. E. C. SMITH, *V. P.*; O. A. SHARPLESS, *Treas.*; A. F. ROBERTS, *Sec.*; S. J. JONES, *Asst. Treas.*

Notice the unique staggered pattern and the double row of wires.

From a Background of 116 years... comes this

RADICAL DESIGN

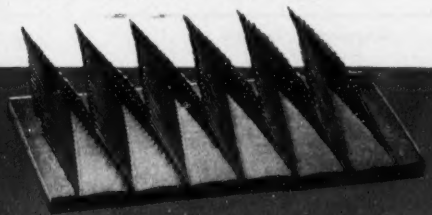
IN A SELF-STRIPPING FANCY FILLET FOR WOOLEN CARDS

Since 1834, the Belgian firms of Duesberg-Bosson have been designing and building textile machinery and the necessary equipment required for its operation. As an outgrowth of many generations of experience, this patented self-stripping Fancy Fillet for 20 years has met with outstanding success in many foreign countries. Now it is being manufactured in the United States, so as to provide the very best service to American mills.

Several highly desirable advantages are assured: 1. Increased card production, due to 50% reduction of down-time for stripping. Your cards work *double time!* 2. Saving of half the labor formerly required for stripping. 3. Improved yarn quality, because the continuous self-stripping action of the fillet produces cleaner, more uniform roping.

DUESBERG-BOSSON
CARD CLOTHING CO.
JEFFERSON • MASSACHUSETTS

Manufacturers of Card Clothing for Cotton, Wool, Worsted, Silk, Rayon and Asbestos Cards; Brush and Napper Clothing for all types of Napper Machinery. Card Clothing for Special Purposes.



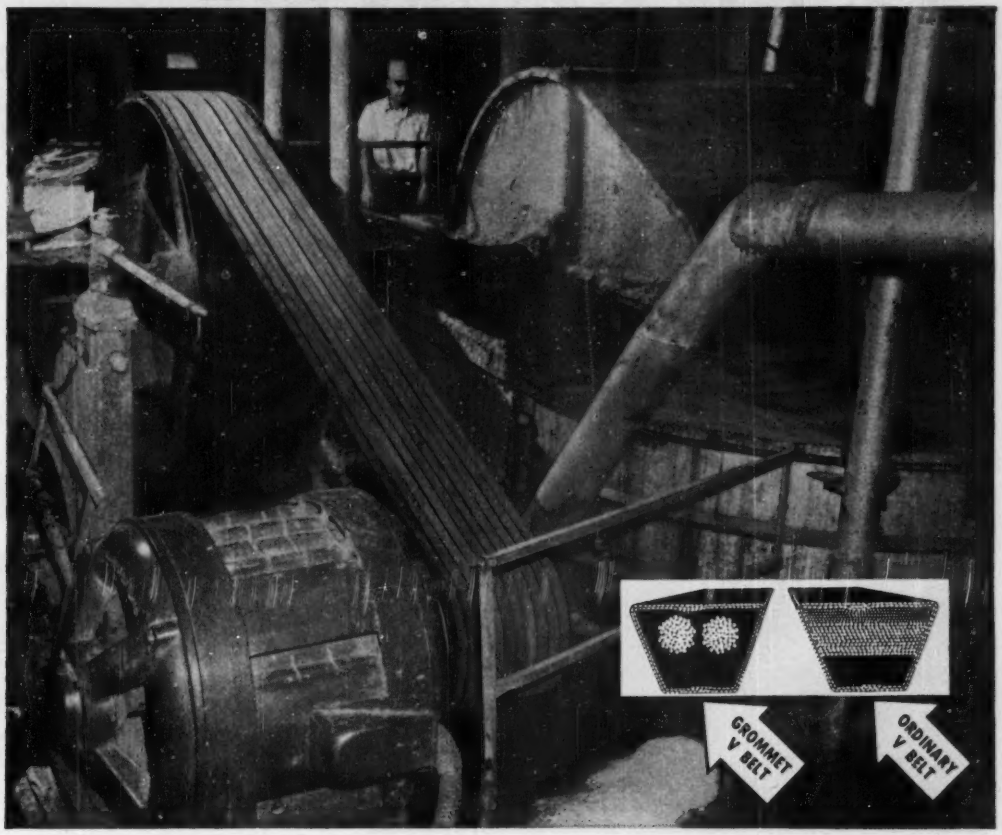
FREE { SAMPLE FILLET ON REQUEST

We have prepared some short lengths of this self-stripping Fancy Fillet. Any interested mill men may have one by asking for it.

DB

All types of comber aprons for the worsted trade. Woolen condenser aprons and tapes. Belting, both round and flat. Sole Distributors, U. S. and Canada, for H. Duesberg-Bosson Fils fine leather specialties, manufactured in Verviers, Belgium.

RESEARCH KEEPS **B.F.Goodrich** FIRST IN RUBBER



Why grommet V belts last 20 to 50% longer

THESE B. F. Goodrich grommet V belts have been running constantly for two years without losing a single minute due to belt trouble. Why?

Twin grommets eliminate causes of belt failures — The B. F. Goodrich grommet is made by winding heavy cord on itself to form an endless loop. There are two of these grommets, placed close to the driving faces of the belt. They make up the load-carrying section. No fabric plies to stiffen and build up heat. Because most belt failures occur where cords overlap, this *endless* cord section eliminates the cause of belt failures.

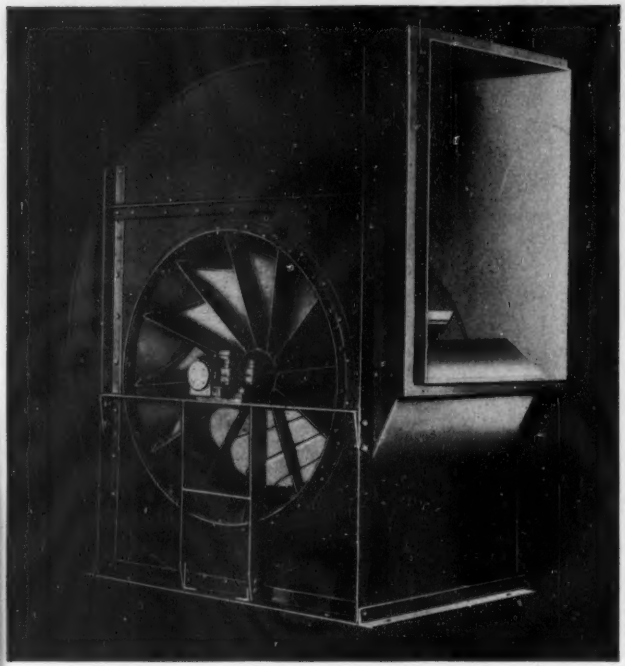
Grommets work all the time — In an ordinary belt much of the cord strength is lost, wasted in the center of the belt where the cords don't pull their share of the load. But in the grommet belt, there are no center cords to loaf. The grommets do the work, stay at it all the time.

Grommet V belts last longer — Laboratory and field tests show grommet V belts last 20 to 50% longer. The twin grommet construction (U. S. Patent No. 2,233,294) is a result of the constant research going on at B. F. Goodrich. No other V belt is a grommet V belt. Now available in C, D and E sections.

A special demonstrator "X-ray" belt has been made to show the grommet construction. Ask your local BFG distributor to bring it around. *The B. F. Goodrich Company, Industrial and General Products Division, Akron, O.*

Grommet V Belts BY
B.F.Goodrich
RUBBER FOR INDUSTRY

Right FOR YOUR Big AIR JOBS!



"Buffalo"

"LL" FANS

● **CANNOT BE OVERLOADED**

regardless of duct length. Housing extends beyond scroll development for true cut-off tangent to wheel.

● **HIGH EFFICIENCY**

Correctly shaped double backward curved blades — proper housing shape — directional inlet vanes — mean top efficiency.

● **QUALITY CONSTRUCTION**

Rigid, sturdy housings and die-stamped blades, strong mounting brackets, mean long fan life. Sleeve bearings are self-aligning and have extra large oil reservoir.

● **QUIET RUNNING**

"LL" Fans move high volumes of air at slow rotor speeds. Perfectly balanced rotors and directional inlet vanes, too, make for very quiet operation.

● **COMPLETE SIZE RANGE**

from 600 c.f.m. to 500,000 c.f.m. and choice of arrangements assure your picking the right fan for the job. *For complete details . . .*

WRITE FOR BULLETIN 3675

"Buffalo" FIRST FOR FANS

BUFFALO FORGE COMPANY

175 MORTIMER ST. BUFFALO, N. Y.

Canadian Blower & Forge Co., Ltd., Kitchener, Ont. Branch offices in all Principal Cities

VENTILATING FORCED DRAFT · AIR WASHING COOLING · AIR TEMPERING HEATING · INDUCED DRAFT EXHAUSTING PRESSURE BLOWING

TURN FIBER WASTE INTO PROFITABLE PRODUCTS!

WITH THE

RANDO-FEEDER*

AND

RANDO-WEBBER*

HEAVY MATS

WADDING

INDUSTRIAL NON-WOVEN FABRICS

FELTS

HOUSEHOLD NON-WOVEN FABRICS

*T.M. Reg.
CURLATOR CORP.
ROCHESTER, N.Y.

Here is an entirely new process for utilizing fibers to produce a random or non-oriented web on a continuous basis. The web or mat—40 inches wide and weighing ½ ounce to 8 ounces per square yard—is suitable for further processing into felts, wadding, heavy mats, and non-woven fabrics. We invite inquiries from companies having facilities for developing finished products or who are now manufacturing such products by other means.

SOME OF THE FIBERS PROCESSED. To date waste fibers from reclaimed tire cord, napper flocks, heather waste, cotton linters, jute waste, garnetted cotton clips, Axminster loom waste, cotton, rayon and nylon mill waste and threads, wool noils, plasticized cellulose acetate and other similar materials have been processed.

SUGGESTED PRODUCTS. From these low cost fibers saleable products such as floor backing, rug cushions and backing, insulation, tapes, filters, laminate reinforcements, packing materials, felts, towelling, diapers, tissues and other products may be made.

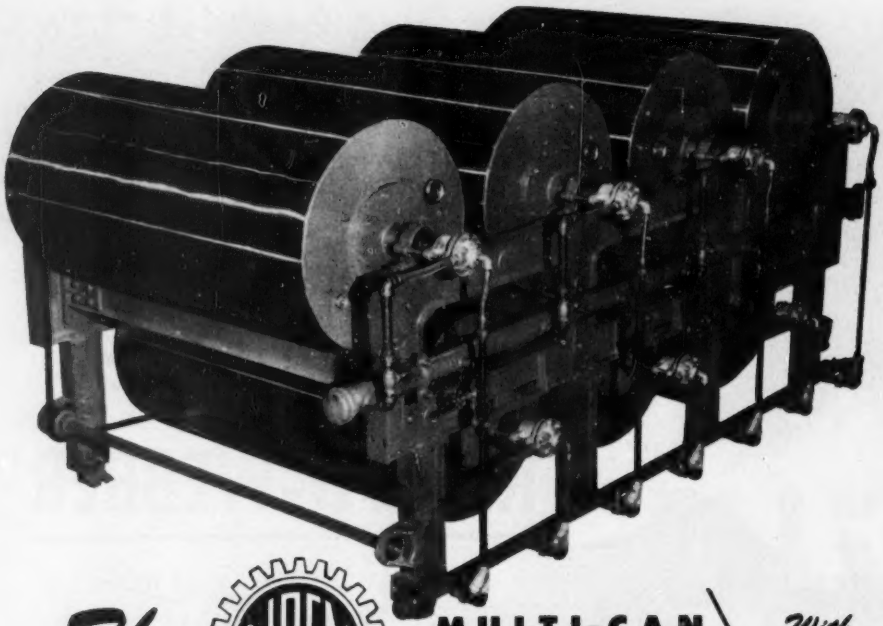
TURN YOUR WASTE FIBERS INTO $$$'s. Write for new Random Web Process Bulletin 101 and for a demonstration of the processing of your fibers.

TEXTILE DIVISION
CURLATOR
CORPORATION
ROCHESTER 10, NEW YORK

Curlator Corporation, Textile Division
503 Blossom Road, Rochester 10, New York

- ☐ Please schedule a demonstration
- ☐ Please make up samples from my own waste
- ☐ Please send Random Web Bulletin 101

NAME .....
COMPANY .....
ADDRESS .....
CITY .....



The WPF&M MULTI-CAN SLASHER

With 5, 7, 9, or 11 30" CYLINDERS

The WPF&M Multi-Can Slasher is designed to produce quality warps from fibers suited to this type slasher, at high speed and low operating costs.

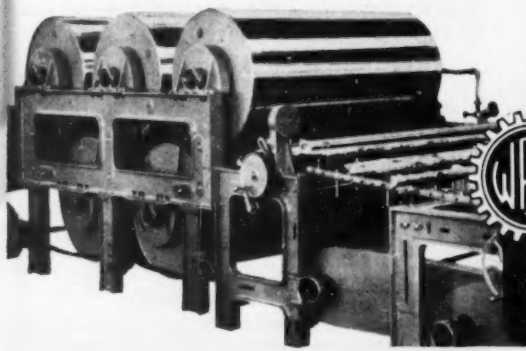
Furnished with either 5, 7, 9 or 11 thirty-inch diameter cylinders, the WPF&M Multi-Can Slasher can be adapted and equipped to fill any mill requirement.

If existing head ends and size boxes are in good condition, they can easily be adapted for use with the Multi-Can cylinder section. Or, the WPF&M Multi-Can Slasher can be furnished complete with any of several types of modern WPF&M head ends, drives and size boxes.

The polished, stainless steel cylinders, with welded-in steel heads, can be operated at pressures up to 35 psig. Rotary packless steam joints and sealed, self-aligning anti-friction bearings provide smooth, trouble-free operation. Each cylinder is equipped with vacuum valve, thermometer, condensate trap and flexible pipe connections. Temperature control can be provided for manifold, group or individual cylinder control.

Roller chain sprocket drive with tension idlers is smooth, quiet running. Either mechanical or electrical type tension control between cylinders and size box, and head end and cylinders are available. Heavy rigid cast iron frames, accurately machined to maintain alignment, support the cylinders.

The WPF&M Multi-Can Slasher is one of the complete line of modern Slashers manufactured by the West Point Foundry & Machine Company—specialist in Slasher Room machinery and equipment.



WPF&M WARP PREPARATION MACHINERY

STANDARD 2 and 3 CYLINDER SLASHERS
MULTI-CAN SLASHERS
WPF&M HI-SPEED 4 CYLINDER SLASHERS
CALLAWAY SAMPLE SLASHER

SLASHER MODERNIZATION EQUIPMENT

HI-SPEED HEAD ENDS WITH STRETCH CONTROL
STANDARD WPF&M HEAD ENDS
MULTI-MOTOR DRIVES and CONTROLS
TEMPERATURE, SPEED and TENSION CONTROL DEVICES
HI-SPEED SIZE BOXES
MODEL 50 SIZE BOXES
STANDARD SIZE BOXES
SIZE KETTLES and EQUIPMENT

WEST POINT FOUNDRY & MACHINE CO.
WEST POINT, GEORGIA

SURE AS HOOTING...

TRITON X-100

speeds your processing from gray to finish

Makes water wetter —so it penetrates better

TRITON X-100 is a concentrated 100% active penetrant and detergent, non-ionic, and alkali-and-acid stable. As a scouring agent for wool, cotton and synthetic fibres, it is a fast wetter, an excellent detergent and an outstanding emulsifier for oil and grease. And in dyeing and finishing too, it speeds processing and cuts costs. Be wise and thrifty. Send for full details of TRITON X-100 today.

CHEMICALS FOR INDUSTRY

ROHM & HAAS COMPANY

WASHINGTON SQUARE, PHILADELPHIA 5, PA.

Representatives in principal foreign countries

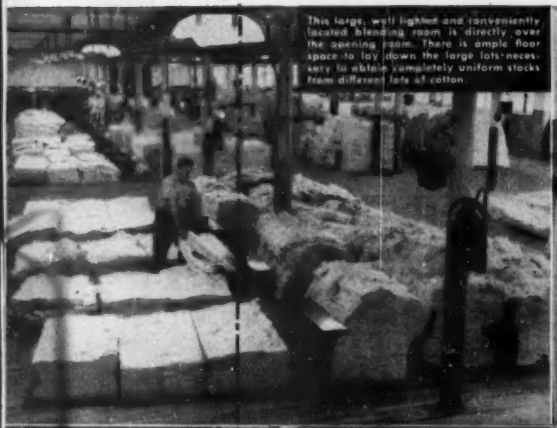
TRITON is a trade-mark, Reg. U. S. Pat. Off. and in principal foreign countries.

STRAIGHT-LINE OPENING AND

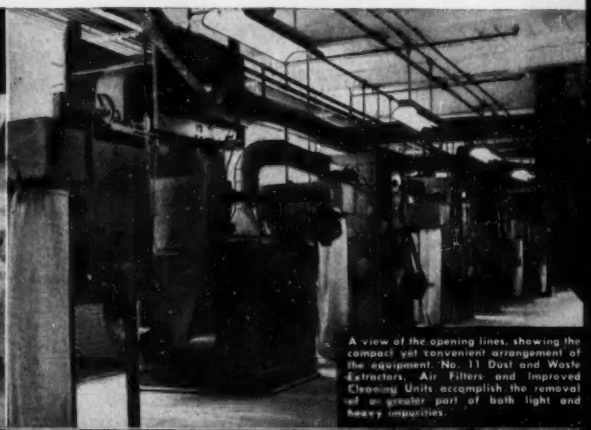
HERE IN THIS FAMOUS NEW ENGLAND MILL IS AN INSTALLATION OF OUTSTANDING MERIT!

The standard SACO-LOWELL units are arranged in a compact, straight-line production assembly which provides controlled **uniform flow** of the stock. This scientifically planned installation operates with economy of man-power, high machine efficiency, and produces laps of excellent qualities.

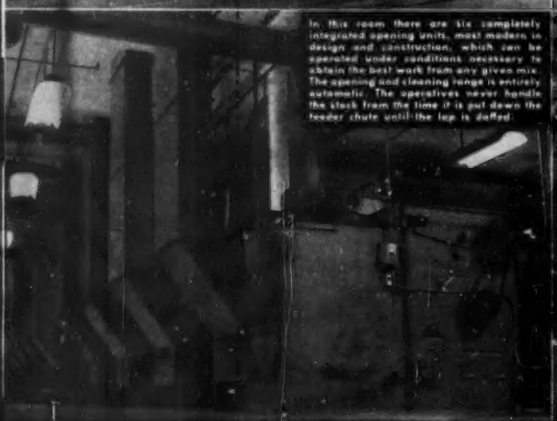
The CONTROLLED PROCESSING secures for the mill a high recovery of unbroken and undamaged fibers, thorough cleaning, even laps, and good running work in the carding and spinning rooms.



This large, well lighted and conveniently located blending room is directly over the opening room. There is ample floor space to lay down the large lots necessary to obtain completely uniform stocks from different lots of cotton.



A view of the opening lines, showing the compact yet convenient arrangement of the equipment. No. 11 Dust and Waste Extractors, Air Filters and Improved Cleaning Units accomplish the removal of a greater part of both light and heavy impurities.



In this room there are six completely integrated opening units, most modern in design and construction, which can be operated under conditions necessary to obtain the best work from any given mix. The opening and cleaning range is entirely automatic. The operatives never handle the stock from the time it is put down the feeder chute until the lap is doffed.

A look into the picker room, showing the 32 Model F-4 Saco-Lowell Pickers, with Blending Reserves and Air Filters. Here you are looking at one of the newest and most efficient picker rooms in operation today.

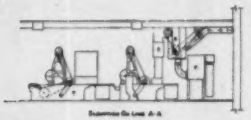
SACO-LOWELL

60 BATTERYMARCH STREET, BOSTON 10, MASS.

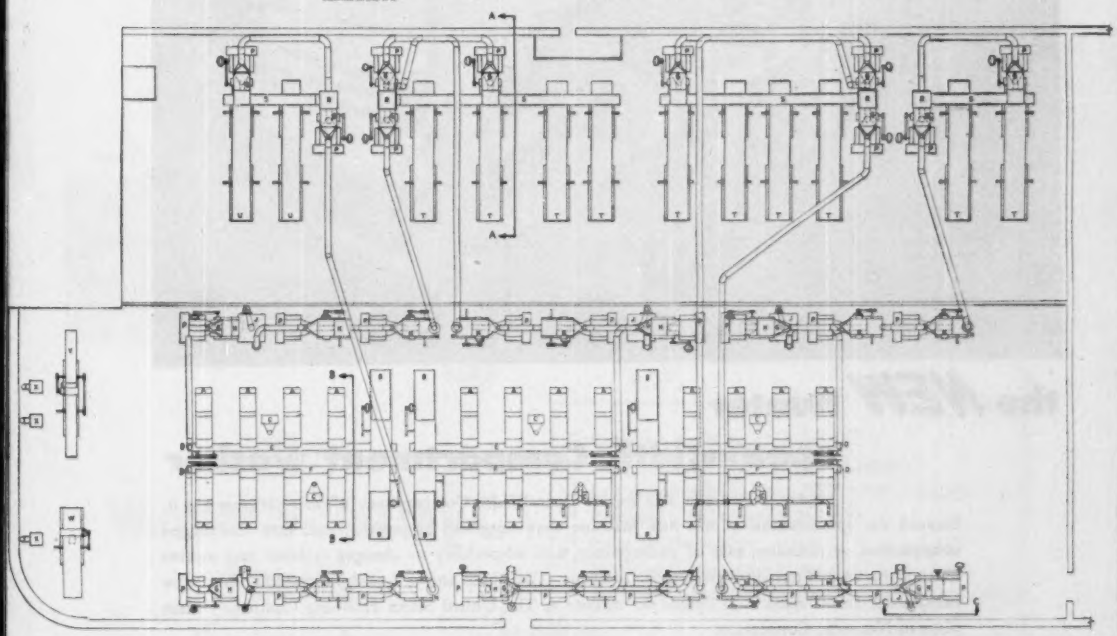
Shops at BIDDEFORD, MAINE and SANFORD, N. C.

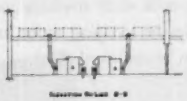
PICKING AT BATES IN LEWISTON, MAINE

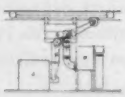
With **cotton** and **operating costs** at the 1951 level, in many cases important savings can be made by improving the layout and equipment in Opening and Picking.



SYM		
A	24	NO. 7 FEEDERS WITH MOTORS & FANS-18 WITH COMBS & 12 WITH COMBING ROLLS
B	6	42" PS WASTE FEEDERS
C	6	NO. 7 TWO BAG FILTERS
D	6	ERIEZ MAGNETS
E	3	36'-0" MIXING FEED TABLES
F	3	35'-6" MIXING FEED TABLES
G	16	NO. 11 CONDENSERS
H	6	G.I. CHUTES FROM NO. 11 COND. TO V.O.-2 WITH BY-PASSES
J	6	VERTICAL OPENERS
K	7	NO. 12-S LATTICE OPENERS WITH NO. 11 CONDENSER FEEDS
L	3	NO. 12 LATTICE OPENERS WITH NO. 11 CONDENSER FEEDS
M	2	NO. 12 LATTICE OPENERS WITH NO. 11 CONDENSER FEEDS
N	6	ADJUSTABLE CONE MOUTHS
P	28	NO. 6 AUTO. AIR FILTERS
R	4	NO. 2 OVER-FLOW RESERVE BOXES
S	4	NO. 2 AUTO. CONTROL FEEDING SYSTEMS
T	18	MODEL F-4 48" ONE PROCESS PICKERS
U	2	MODEL F-4 40" ONE PROCESS PICKERS
V	1	TWO SECTION W-3 WASTE MACHINE
W	1	48" FINISHER PICKER
X	3	NO. 34 AIR FILTERS





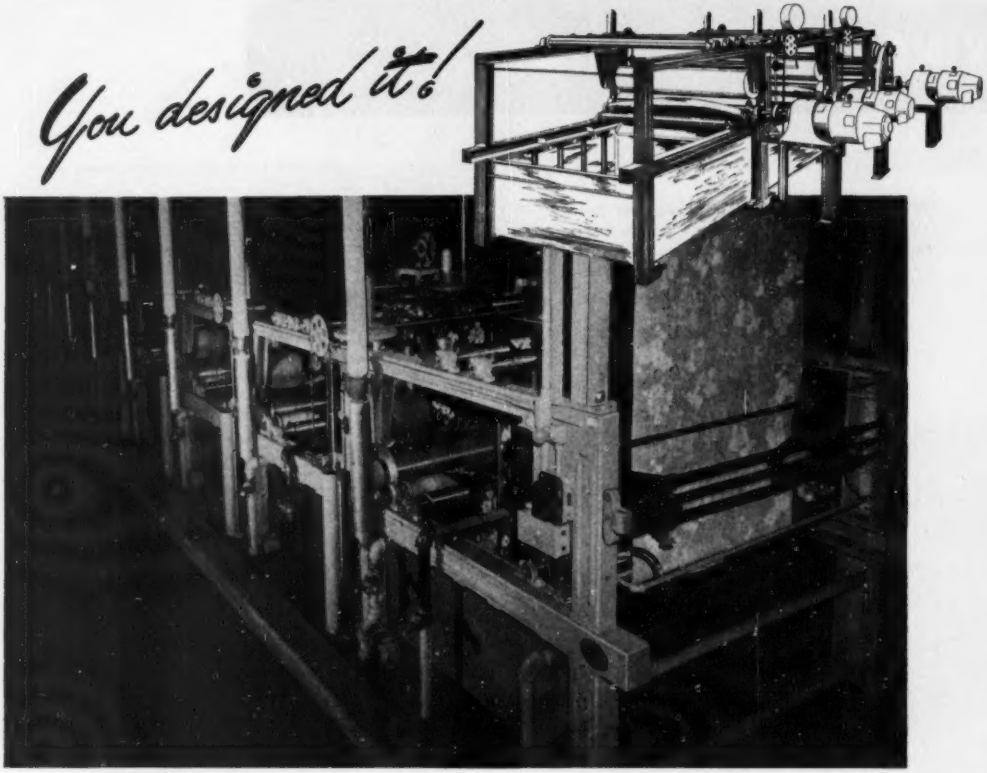


Those mills which have not improved their opening and picking within the last few years will find it worth while to have our engineers survey their installations, to determine what savings can be made by straight-line, controlled processing, and modern equipment.

IT'S ALWAYS WISE TO SACO-LOWELL IZE

SALES OFFICES: CHARLOTTE • GREENVILLE • ATLANTA

You designed it!



the *NEW* Hunter
open-width Compartment washer

What would you like for an Open-Width Compartment Washer? Hunter has it, because the specifications of this new machine were suggested by practical mill men. Its rugged construction, accessibility, ease of maintenance, and adaptability to changes in fabric and routine make it the finest Compartment Washer available. The photo shows 2-yard-per-pound cotton print being soaped and rinsed at 125 yards per minute at The United States Finishing Company's main plant in Norwich, Connecticut.

Each tank includes stainless steel bottom and rubber covered top nip rolls with stainless steel idler rolls at the top and specially constructed reels in the bottom to help the scouring action and loosen the gum. All rolls are mounted on separate frames, and any part can be removed without the disassembly of other parts.

The new Hunter Washer is the perfect production tool for soaping, oxidizing, desizing, washing, etc. Complete details to cover your own requirements are yours for the asking.

Write for free Catalog . . .

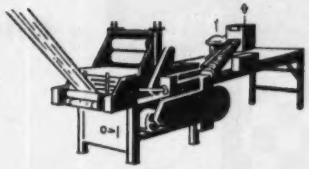
Call in a HUNTER Field Engineer...

D. L. Raedel, 1936 West Lake Street, Chicago, Ill.
S. Alex Dalghren, Ivyland, Bucks County, Pa.
J. Everett Burdick, Grayson Lane, Newton Lower Falls, Mass.
E. G. Paules, 1762 West Vernon Avenue, Los Angeles, Calif.
Rudel Machinery Company, Ltd., Canada
Carl Endlein, 1734 Candler Building, Atlanta 3, Georgia

Hunter

JAMES HUNTER MACHINE CO., NORTH ADAMS, MASS. FOUNDED 1847.

Now, ONE MACHINE changes synthetic tow to crimped sliver

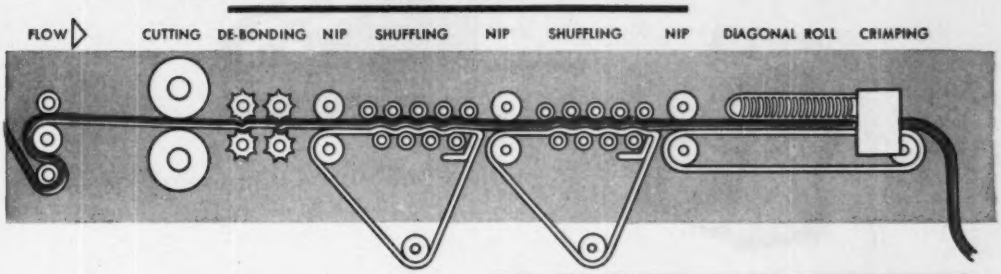


● Now, in one efficient operation, the Converter changes synthetic tow into cut staple ready for the drawing operations.

Fibers enter the Converter as continuous tow, where they are cut to the desired length, either uniform or varied, up to six inches maximum. They emerge as drawn crimped sliver, ready for further integrating and reducing operations.

As a result, the Converter is a real cost-saver. It eliminates entirely such operations as mixing, picking, carding, gilling, and combing. And the original cost of the machine is only a fraction of the cost of the machines it replaces. There is a big saving in floor space. And one operator can handle two or more Converters.

Our Field Engineer in your territory can give you complete information. Or write today for our new Converter Bulletin.



The Warner & Swasey-Pacific Converter

- Cuts staple 3" to 6" in length
- Insures exact percentages of blend
- Retains finish, appearance, and strength
- Ruggedly designed and built
- Easy to maintain
- Minimum floor space needed
- All parts interchangeable between machines

BRANCH OFFICES
Rivulet Mill, Uxbridge, Mass.
6910 Market Street, Philadelphia, Pa.
Candler Bldg., Atlanta, Ga.

WARNER & SWASEY
Cleveland
TEXTILE MACHINERY DIVISION

YOU CAN PRODUCE IT BETTER, FASTER, FOR LESS...WITH A WARNER & SWASEY

FABRIC begins with an—

and

DU PONT

REG. U.S. PAT. OFF.

BETTER THINGS FOR BETTER LIVING
...THROUGH CHEMISTRY

FOR NYLON...FOR RAYON

ACETATE DIVISION • NYLON DIVISION • RAYON DIVISION

the "F" turns out to be FIBER!

Funny thing about a fabric . . .
Somebody has to think it up,
Somebody has to say it's good,
Somebody has to produce it,

Somebody has to find a fiber.

For quality fibers . . .
fibers that have found their way into exciting, talked-about fabrics,
fibers that have kept those fabrics sound . . .

Du Pont **nylon**
Du Pont **acetate rayon**
Du Pont **viscose rayon** are the beginnings
of the fabrics and fashions of tomorrow.

And Du Pont is looking ahead to fibers
that will make tomorrow's fashions
even more exciting, wearable, long-livable!

. . . FOR FIBERS TO COME . . . LOOK TO DU PONT!

Rayon Department, E. I. du Pont de Nemours & Co. (Inc.), Wilmington 98, Delaware

MAKE YOUR BALING A *Profitable* OPERATION *with a* LOGEMANN BALER

Tell Us Your Baling Problems

THAT'S the best way to get the right answers to low-cost time-saving baling. During our sixty years of building balers for the textile industry we've solved many a baling problem for factory owners. Our engineers know how to make baling operations pay their own way in time and labor-savings, in speedier, more reliable handling of bales, in lower maintenance costs. Many Logemann balers have been in profitable operation since the turn of the century—evidence of the ruggedness, durability, and long service life of Logemann baling presses.

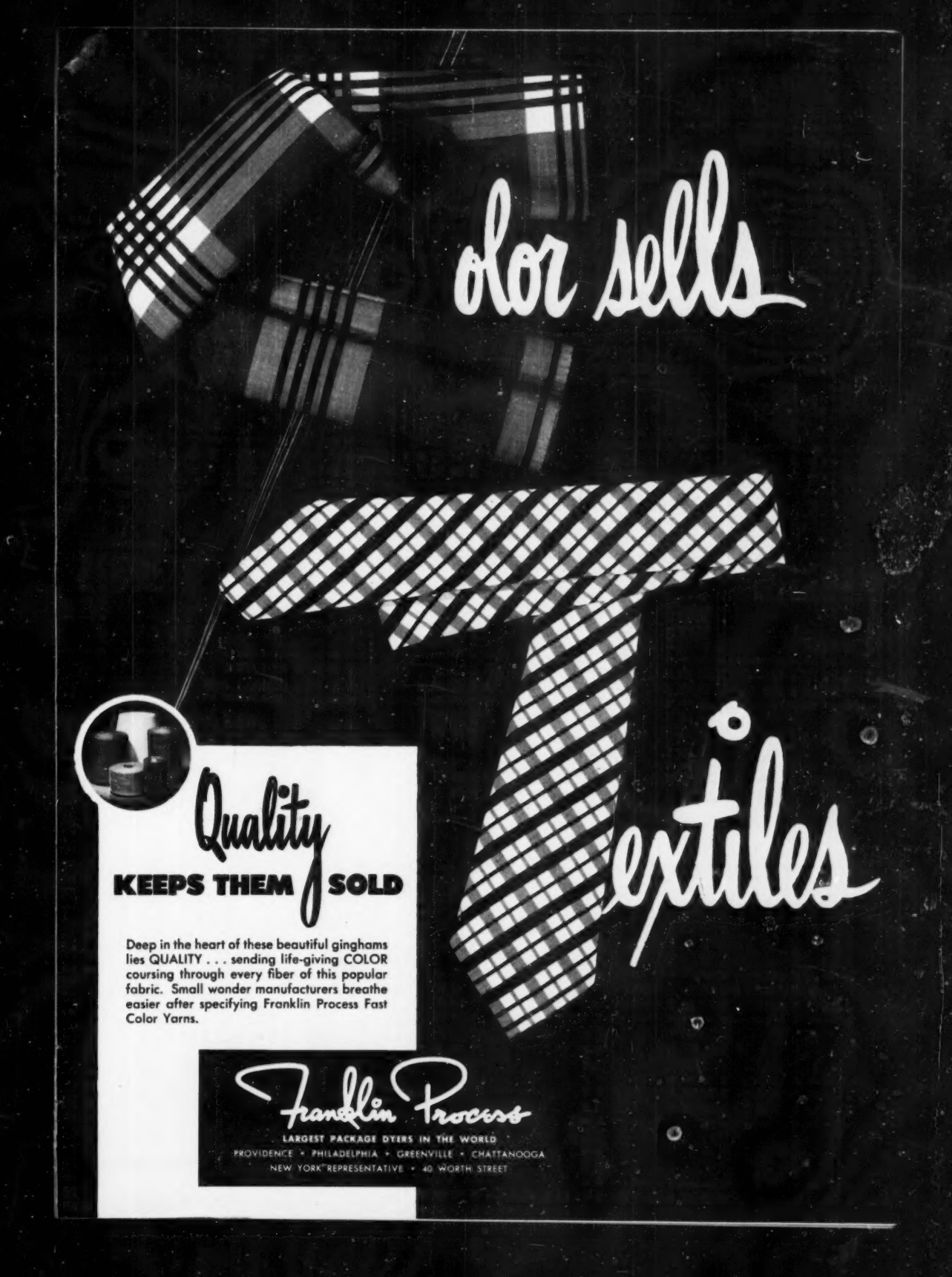
In the interests of better baling operations in your factory, find out what Logemann balers can do for you. Tell us what your specific problem is. We'll gladly show you how it can be answered in terms of better bales at lower costs and make a specific recommendation based on your requirements. Write for information today.

Open balers for finished goods may be hydraulic or power-driven. Give platen dimensions required, maximum height of pile to be compressed, number of bales per hour, when requesting information on open balers.

Box balers for waste may be obtained in either the hydraulic or power-driven type. Mention the kind of waste to be baled, how much in how many hours, the preferred size or weight of bale when inquiring about box balers.

LOGEMANN BROTHERS CO.

3100 West Burleigh Street • • • Milwaukee 10, Wisconsin



Quality KEEPS THEM SOLD

Deep in the heart of these beautiful ginghams lies QUALITY . . . sending life-giving COLOR coursing through every fiber of this popular fabric. Small wonder manufacturers breathe easier after specifying Franklin Process Fast Color Yarns.

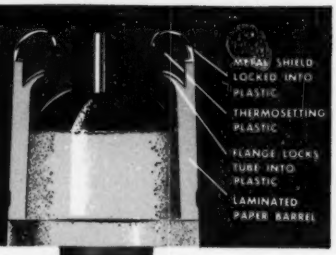
Franklin Process

LARGEST PACKAGE DYERS IN THE WORLD

PROVIDENCE • PHILADELPHIA • GREENVILLE • CHATTANOOGA

NEW YORK REPRESENTATIVE • 40 WORTH STREET

BOBBINS



Precision-molded— they *STAY TRUE PERMANENTLY*

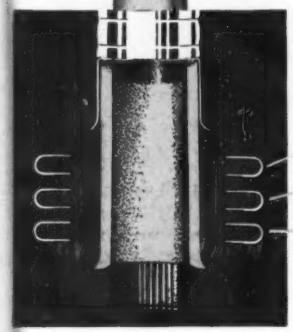
Automatic Loom Bobbin for Plunger Type Electric Feeler.

FILLING BOBBIN

Patented "Plasti-weld" method plastic welds base, tube and rings into a single unit. Rings are positioned with utmost precision in relation to tube, PERMANENTLY assuring a bobbin that cannot cause mis-transfer.

WARP BOBBIN

Seat, metal tip and tube are plasti-welded together to a new standard of precision by patented thermosetting plastic molding method. True-running from the first day . . . and always . . . because the inert fibrous tube material retains its original shape throughout its life.



RINGS ARE *Continuous*

Rings are immovably plastic-welded in position and have no open area to invite mis-position in transfer.

*Patented

Warp Bobbin for Various Types of Spindles.

American Paper Tube Co.

ESTABLISHED 1898

WOONSOCKET, R. I. GREENVILLE, S. C.

CANADIAN REPRESENTATIVE, HUGH WILLIAMS & CO., TORONTO, CANADA

Write for Brochure:

"PLASTI-WELD BOBBINS"

*ARIPERM pm

Your reputation won't fade... if your acetate fabrics don't!

***ARIPERM PM® Prevents Gas Fading**

When colors fade, so does consumer confidence in the manufacturer's label; this "backs up", eventually, to the dyehouse. There's no need for this with fabrics (partially or wholly) of ACETATE RAYON, for *they can be given protection against fading from atmospheric gases. ARIPERM P M does the job.* Its durability means exceptional protection through washing and dry cleaning.

ARIPERM P M is especially valuable for dyeing Light Shades, Pastels and Tints, since it does not throw the shade over to the yellow. Application is simple, in scouring or directly in the dyebath. Write for details, sample, demonstration.

Arkansas Co. INC.

MANUFACTURERS OF INDUSTRIAL CHEMICALS FOR OVER 45 YEARS
NEWARK, NEW JERSEY

Arkansas Co., Inc.
184 Foundry St.
Newark, N. J.

Gentlemen:
I would like to have, without obligation:

- ☐ full details of ARIPERM P M benefits
- ☐ sample and application procedure
- ☐ demonstration in plant

HAME _____ TITLE _____

FIRM NAME _____

ADDRESS _____

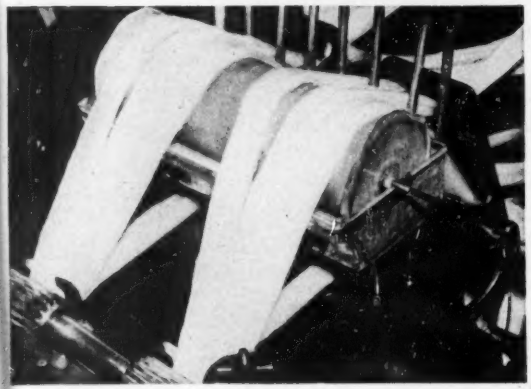
CITY _____ STATE _____

the ¢ FEW extra ¢ents that make a LOT of sense

When it comes to producing worsted yarn, there is always this important question: Should a spinner spend a few more cents than absolutely necessary when processing top, to try and achieve more efficient production and better finished products? In the case of Nopco* 1656-R, the answer is "yes".

Today; the price of top is the highest in history. Thus the few additional cents involved in the purchase of Nopco 1656-R become insignificant in the face of over-all costs. Moreover, the unique advantages afforded by this remarkable oil far outweigh its price differential when compared to alternatives. Just consider:

NOPCO* 1656-R...



1 ***provides excellent lubrication and eliminates static in worsted sliver. Result: no fly from top treated with this oil—fewer ends down in spinning and winding—much less brush waste;***

2 ***increases the drag, and thereby gives a better draft—resulting in more even and cleaner yarn;***

3 ***scours out with phenomenal ease—actually converting into suds when used with alkali, polyphosphate and water;***

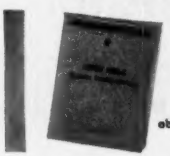
4 ***applies equally to all production systems—American, Bradford or French—and is extremely advantageous on pin drafters.***

*Reg. U. S. Pat. Off.

Yes, it will profit you to use Nopco 1656-R wherever you employ a lubricant in your top-processing procedure. And it will profit you to specify Nopco 1656-R, as a number of spinners already do, whenever you purchase oil-combed top. You'll pay a few more cents above "rock bottom" perhaps, but when you examine your finished yarns, you'll know you have produced high quality products with surprising economy.

NOPCO TRADEMARK INVOLVED THRU RESEARCH

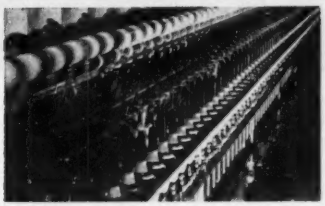
NOPCO CHEMICAL COMPANY
HARRISON, NEW JERSEY
Branches: Boston, Chicago, Cedartown, Ga., Richmond, Calif.



Send for your FREE copy of this bulletin giving detailed information about Nopco* 1656-R

Only **HERR** *makes the* **"CONICAL RING"**

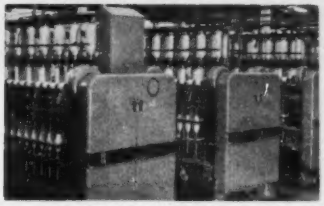
. . . and only the "Conical Ring" wins this kind of praise from the industry's leading mills



THE BEST . . .

"We have found the Herr Conical Ring to be the best for us on 100% wool worsted, 100% spun nylon, and mixed fibres. We have less ends down, and the rings aid in producing an even yarn. Our results with these rings have been most satisfactory."

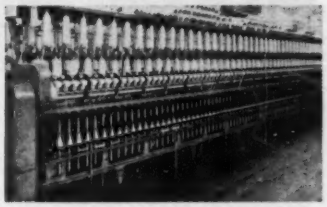
K. D. Nixon, General Manager
Newnan Cotton Mills



ADVANTAGEOUS . . .

"The self-lubricating principle of the Herr ring is advantageous in the manufacture of uniform yarn, gives low end down results and facilitates spinning on a large package."

H. J. Blanchard, Resident Manager
Collins & Aikman Corp., Norwood, N. C.



MOST SATISFACTORY . . .

"After trying other types of rings, we have found Herr Conical Rings most satisfactory on worsted yarns. All of our new worsted frames were ordered equipped with Herr Conical Rings."

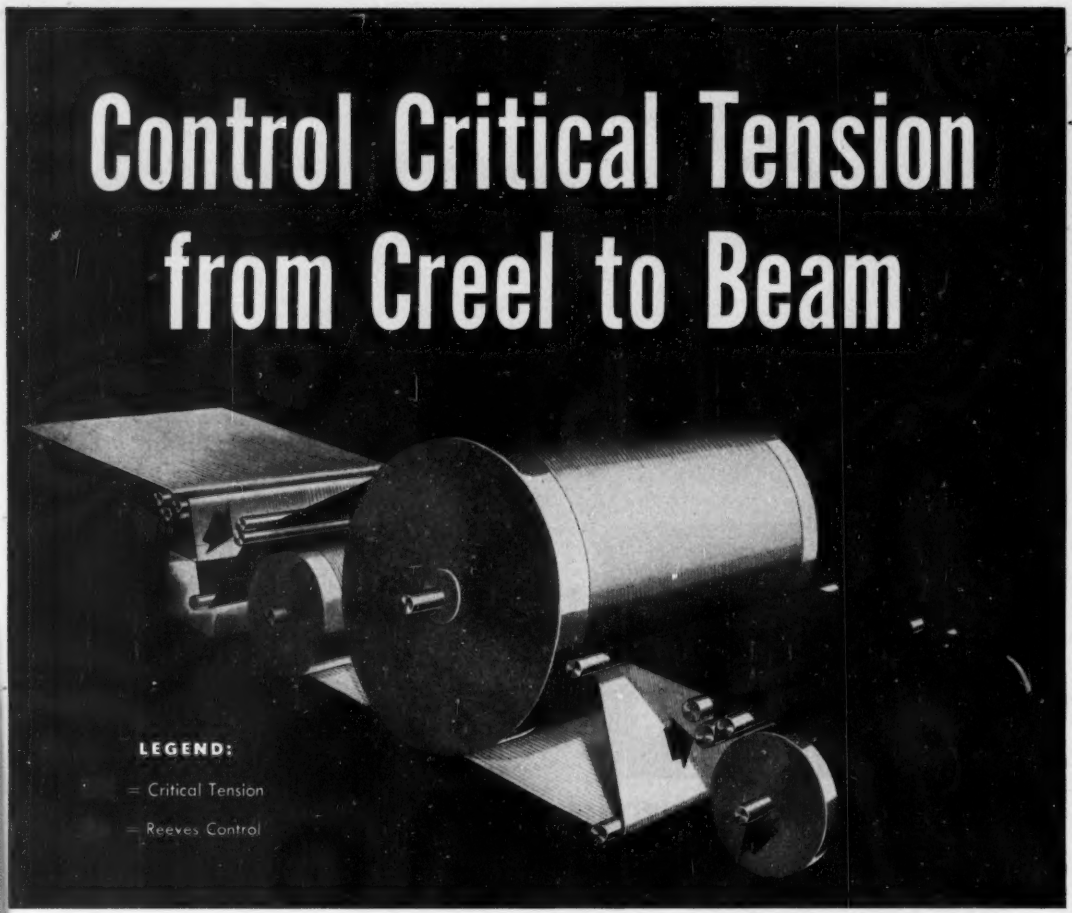
Eugene H. Timanus, Manager
Spun Fibers, Inc., Whitnel, N. C.

Herr Conical Rings are used for quality spinning and twisting of Wool, Worsted, Synthetic and Blended Yarns of all types; and for Cotton Twisting. The conical shape produces an outward and downward action with the traveler riding on the top and side face of the ring. This is the factor that produces high quality yarn with minimum breaks. The controlled lubrication of the Herr Conical Rings produces a long life to the traveler with re-wicking eliminated. Write us to have one of our representatives call and discuss your ring problems with you.

HERR MANUFACTURING CO., INC.

318 FRANKLIN ST., BUFFALO, N. Y.

Control Critical Tension from Creel to Beam



The problem of tension control, *always* a big bugaboo in slasher operations, can now be positively and effectively controlled with the new REEVES "Servo-Control" Slasher Drive.

This completely integrated and completely synchronized REEVES Slasher Drive provides accurate and sensitive tension control at ALL critical points, from creel to beam! It operates with equal efficiency on all kinds of yarn—cottons, worsteds, blends and synthetics—despite variations in drying temperature, humidity, drying speeds, etc. It improves warp quality; increases loom output; and reduces production costs.

Assuring trouble-free service and accurate, sensitive control year after year, the REEVES Slasher Drive is the lowest of all drives in initial cost. It has no complicated electrical hookups and its variable speed mechanism is sturdily constructed,—tested and proved in more than a *quarter-million* REEVES installations of all types. Your own mill mechanics can easily install and maintain the entire unit.

The complete REEVES Slasher Drive consists of only one motor and three basic control units:

1. Main Drive . . . providing a 15:1 speed range to deliver desired "creep," "jog," and "run" speeds for all yarn sets. Readily adaptable to moisture control equipment.
2. Beam Drive . . . with new "Servo-Control." Automatically maintains uniform tension on yarn as it builds up on the beam.
3. Stretch Control . . . for accurate control of stretch between all desired points, from creel to delivery roll.

REEVES Main Drive (left) and "Servo-Control" Beam Drive

Special REEVES Transmission used for stretch control

with REEVES "Servo-Control" Slasher Drive

The Main Drive of the REEVES Slasher Drive is a single, compact REEVES Vari-Speed Motodrive, with a 15:1 speed range and running speeds as high as 100 yards per minute.

Acceleration and deceleration are accomplished smoothly and swiftly, without smashing the yarn, by the mere touch of a button. From "creep to run" and "run to creep," the yarn is under complete, automatic control at all times. The Main Drive always returns to the exact running speed being used at that time.

The Beam Drive consists of a standard REEVES Variable Speed Transmission and the "Servo-Control" system designed by REEVES to meet the sensitive requirements of an effective Beam Drive. It assures accurate, uniform tension control in building the beam, at a speed equal to the slasher's maximum drying capacity. As yarn builds up on the beam, the "Servo-Control" automatically decreases Transmission speed; this, in turn, reducing beam speed to the point necessary to maintain steady, uniform yarn tension and constant surface speed.

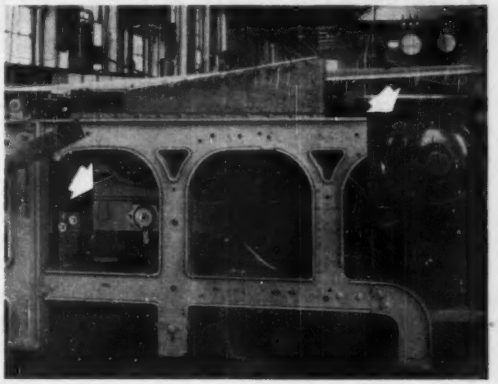
Stretch control is provided by one, or more, REEVES Transmissions. The first drives the squeeze rolls. A second Transmission may be used for optimum control—driving an auxiliary drag roll and installed between creel and size box. Control of the squeeze rolls assures delivery of wet yarn to the drying unit under minimum tension. The variable speed control between creel and size box puts the greatest tension on the dry yarn and leaves practically no tension on the wet yarn as it passes through the size box.

Make your slasher operations more productive and more profitable by installing the new REEVES "Servo-Control" Slasher Drive—now ready for immediate delivery. Write for free bulletin described below.

REEVES PULLEY COMPANY • COLUMBUS, INDIANA

Recognized Leader in the Specialized Field of Speed Control Engineering

Main Drive and Beam Drive fit neatly beneath the slasher head frame, occupying unused and otherwise wasted floor space.



accurate · variable **REEVES** *Speed Control*

NEW BULLETIN; JUST OFF THE PRESS

Write today for new, 8-page, bulletin illustrating and describing in detail the new REEVES "Servo-Control" Slasher Drive. Contains invaluable technical data for every textile mill engineer. Send for Bulletin No. T-46a-G-503.

L. F. Dommerich & Company

Executive and General Offices

271 MADISON AVENUE
NEW YORK 16, N. Y.

Telephone: Murray Hill 3-8650

FACTORS

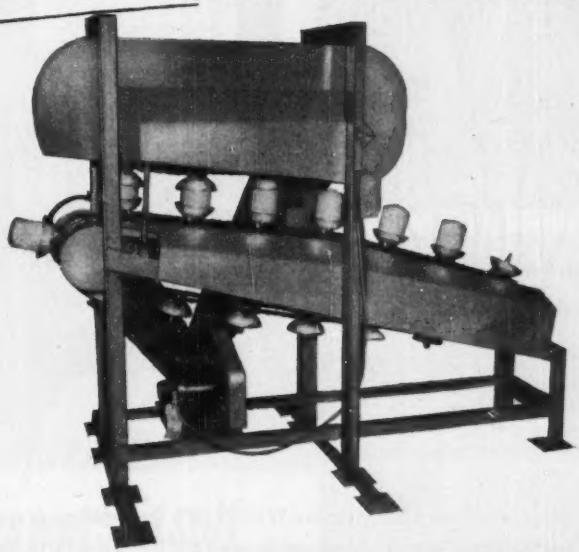
For Manufacturers and Merchants

Inquiries as to our services solicited

•

ESTABLISHED 1840

Presents ANOTHER DYEING IMPROVEMENT



—CONTINUOUS, HIGH-SPEED PACKAGE SHAPING

Now you can form and condition yarn packages for dyeing 7 to 10 times faster than ever before—*and get surer results at the same time*—with Gaston County's new mass-production conveyor-type yarn shaping machine.

Yarn packages are shaped automatically by continuously-moving cups to remove the square hard edges at both ends. Gentle, adjustable squeezing action gives the yarn uniform density throughout. As a result you get smooth, even penetration of dyestuff in every package, particularly helpful in dyeing critical shades.

Your saving in labor costs alone justify installation of this new equipment. Packages are formed at a rate of 3,000 or more per hour, then conveniently deposited for loading on dye carriers. There's no unloading delay, no fumbling with complicated gadgets. Handy position of conveyor cuts loading time to a minimum. Rate of production is limited only by speed of operator. Tube damage is eliminated.

Available models of the high-speed package Shaper will accommodate from 1 to 2 lb. packages wound on ⅝-inch or 1⅛-inch dye tubes. Easily installed. Simply plug it in on your present lighting circuit.

Plan now for this new efficiency in your mill. Write us for full information.

Pioneers in Automatically *Controlled Dyeing Machines*

GASTON COUNTY DYEING MACHINE CO.

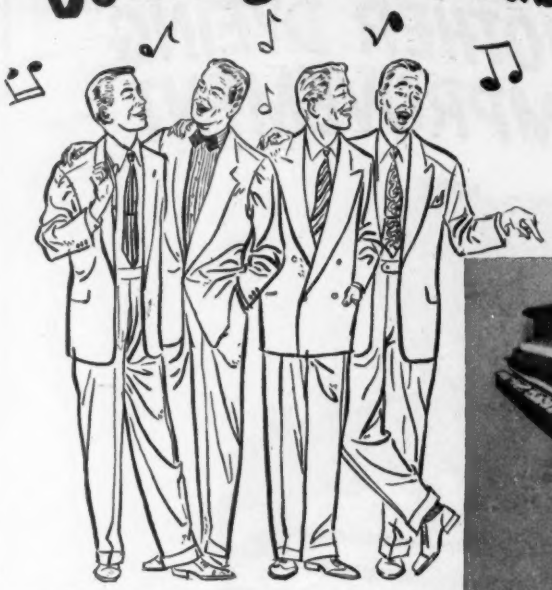
STANLEY, NORTH CAROLINA, U. S. A.

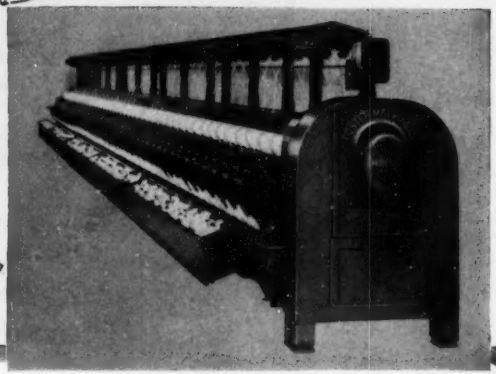
Albert R. Breen
80 East Jackson Blvd.
Chicago, Ill.

Gaston County Dyeing Machine Co.
Terminal Building, 68 Hudson St.
Hoboken, N. J.—G. Lindner, Mgr.

The Rudel Machine Co., Ltd.
614 St. James St., W. Montreal
137 Wellington St., W. Toronto

Doubling's not Troubling Anymore...





. . . Today, progressive yarn manufacturers WELCOME the doubling process as a means to better quality *and* better prices. Doubling eliminates dropped ply, corkscrew yarns, and permits proper inspection — removing slubs and other imperfections. Also, doubling makes for uniform tension on all ends — assures a uniform twist.

The Foster Model 57 Doubler does all this with minimum trouble and expense. Here's why:

1. It has a tension and slub catching device for automatic inspection and uniform tension on multiple threads. This is used when machine is equipped for one process doubling, drawing direct from bobbins, and permits doubling of coarse and fine yarns together with exact control of inspection at each bobbin. When used for two-process doubling the Model 57 draws from cones wound and inspected on the Model 102.
2. Ends are laid parallel on the package, which also makes for even twist.
3. Quick-acting stop motion, with efficient brake, leaves sufficient yarn for single end piecing when supply runs out.

It will pay you to investigate the many additional features of the Model 57, not the least of which are the exceptionally high operating speeds that can be obtained without loss of quality.

Send for Circular A-96, today.

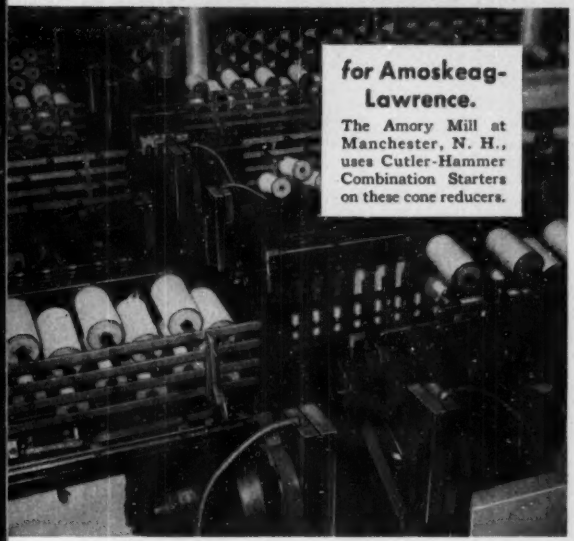
FOSTER MACHINE COMPANY
WESTFIELD, MASSACHUSETTS

Southern Office — Johnston Bldg., Charlotte, N. C.
Canadian Representative — Ross Whitehead & Co., Ltd., University Tower Bldg., 660 Ste. Catherine St., West, Montreal, Quebec; European Representative — Muschamp Taylor Limited, Manchester, England.

FOSTER MODEL 57
For Better Twist by Doubling

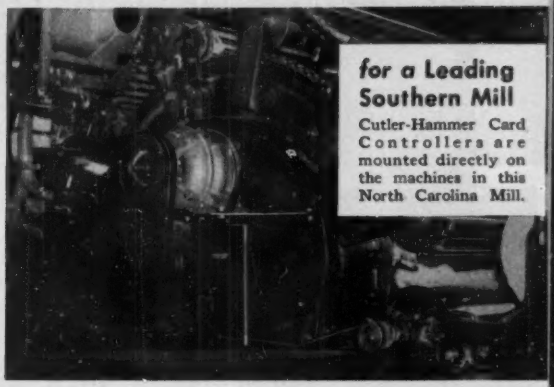
CUTLER-HAMMER

MOTOR CONTROL FOR THE TEXTILE INDUSTRY



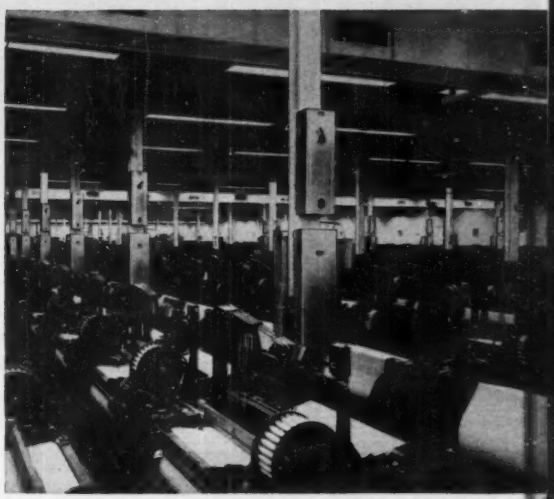
for Amoskeag-Lawrence.

The Amory Mill at Manchester, N. H., uses Cutler-Hammer Combination Starters on these cone reducers.



for a Leading Southern Mill

Cutler-Hammer Card Controllers are mounted directly on the machines in this North Carolina Mill.



One question that answers itself

No responsible textile mill executive will decide the question "*What* motor control?" except in the light of *one fact*. And that is the fact that *profitable* textile production results from the integration of many machines into a single harmonious production unit. The need for such integration spells out the answer to the question right there. For this integration certainly calls for the *best* motor control engineering experience available . . . certainly calls for the *most competent* motor control design and construction available . . . certainly calls for a *proved dependability* in motor control performance. There is only one make of motor control that meets all these specifications, the product of the pioneering specialists in motor control since 1892. CUTLER-HAMMER, Inc., 1456 St. Paul Avenue, Milwaukee 1, Wisconsin.

CUTLER-HAMMER
MOTOR CONTROL
C-H

for Springs Cotton Mills

at Kershaw, S. C., plant. Cutler-Hammer Loom Switches for each group of 10 looms are here mounted in single enclosures on adjacent building columns above mill traffic. Note also single combination starter installed ahead of each group.

CUTLER-HAMMER LOOM SWITCH

for fewer shutdowns, greater production, easier maintenance

Pushbutton operation—most preferred for this type of starter. Stop button can be padlocked.

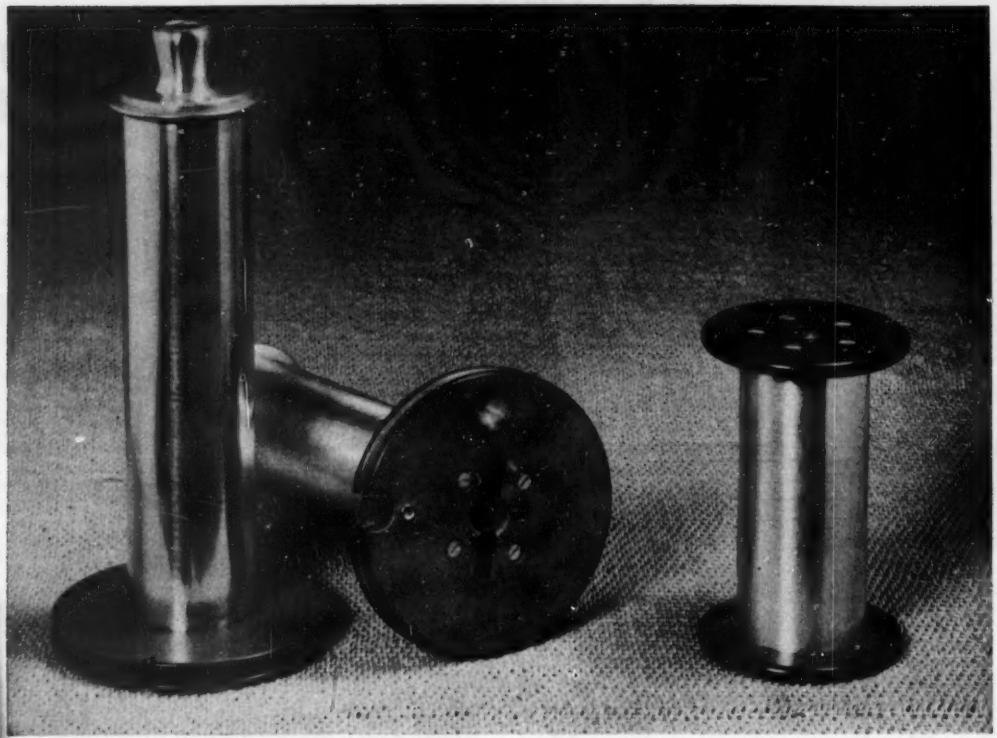
Stronger, smaller, drawn steel case. Unique welded-steel mounting pedestal available to create a *complete* assembly with unparalleled resistance to mechanical damage.

Lint-proof enclosure—close fitting cover (even around pushbutton well) limits entrance of lint and dust.

Service proven, positive make, quick break operating mechanism built on *steel* framework.

"Out in the open" contacts for quicker inspection and easy renewal *on the job*. Most dependable overload protection—famous Cutler-Hammer eutectic element type—prevents unnecessary shutdowns without sacrifice of *positive* motor protection.

Vibration resistant. Mechanism "floats" in truly effective *live* rubber mounting bushings.



LESTERSHIRE . . . . . designers and fabricators of bobbins, to meet the highly exacting requirements of mills and yarn manufacturers who have problems incident to the handling of nylon and other high tenacity yarns.

Lets us give you the facts about

LESTERSHIRE PATENTED UNIT CONSTRUCTION BOBBINS —in all-aluminum bakelite, and vulcanized fiber, or combinations of these materials — designed for concentricity and dynamic balance, resistance to yarn pressures, and adherence to close tolerances.

LESTERSHIRE SPOOL & MFG. CO.

JOHNSON CITY, NEW YORK

SPECIALISTS IN THE PRODUCTION OF BOBBINS TO MEET INDIVIDUAL REQUIREMENTS

Branch Offices and Technical Service

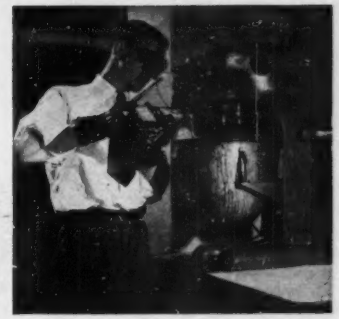
R. B. Dorman—1000 Peachtree St., Atlanta, Ga.
Joseph H. Windle, Jr.—231 So. Main Street, Providence 3, R. I.
Odell Mill Supply Co., Greensboro, N. C.
Greenville Textile Supply Co., Greenville, S.C.
W. S. Taylor, Inc., 52 Vanderbilt Ave., New York 17, N. Y.

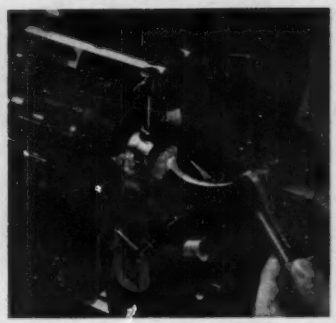
Staple Pilot Plant Featured in new Avisco Illustrated Booklet

Staple Development is spotlighted in a new booklet release by Avisco. It is one more in the series describing the research activities at American Viscose Corporation.

The Staple Development Plant at Nitro, West Virginia, is an important division of Avisco's product research, acting as a bridge between pure research and commercial scale production. Its dual purpose is to serve as a proving ground for the practical development of manufacturing methods as well as to develop new products.

The booklet "Staple Development Plant" tells how this department achieves these objectives . . . how it helped to develop such products as one-denier, varied-length and crimped staple. Copies are available on request to those interested in keeping abreast of advances in the textile industry.





1—During initial stages of work, spinning solution is prepared in miniature mixer.

2—Microtome cuts wax-embedded rayon into microscopically thin slices 2/25,000 of an inch thick. Later wax is melted away and rayon cross section studied.

3—Moisture tests in Emerson oven indicate uniformity of products, provide check on experimental developments.

4—Staple Development scientist uses planimeter on photomicrograph to measure area of cross section of rayon staple.

RAYON 20 YEARS AGO

TOKYO, JAPAN, February 1931—Due to increased Japanese rayon production the Tokyo Rice Exchange will soon deal in rayon yarns.

NEW YORK, February 1931—It is felt that spun rayons heretofore relatively neglected in the United States will now receive extensive promotion.

NEW YORK, February 1931—After 15 years at 171 Madison Avenue, the Viscose Company has moved to expanded quarters at 200 Madison Avenue.

MAKE USE OF *Avisco* 4-PLY SERVICE

To encourage continued improvement in rayon fabrics, American Viscose Corporation conducts research and offers technical service in these fields:

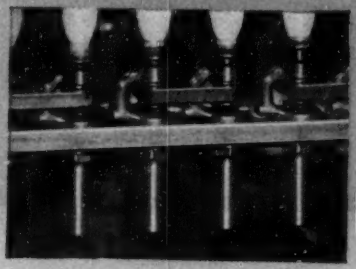
1 FIBER RESEARCH
2 FABRIC DESIGN
3 FABRIC PRODUCTION
4 FABRIC FINISHING

AMERICAN VISCOSE CORPORATION

America's largest producer of rayon

Sales Offices: 350 Fifth Avenue, New York 1, N. Y.; Charlotte, N. C.; Cleveland, Ohio; Philadelphia, Pa.; Providence, R. I.

LESS FRICTION

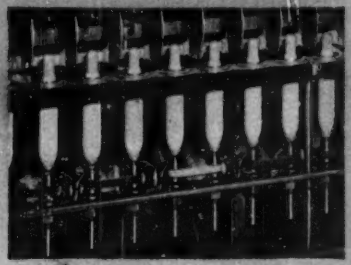


CUT BOLSTER WEAR up to 2/3!

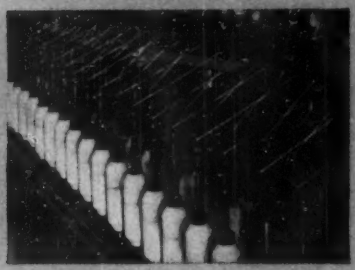
SAVE ON POWER COSTS TOO!

SINCLAIR

LONG BOLSTER LIFE

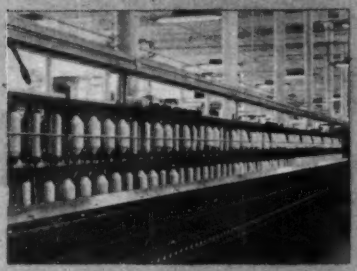


LESS THREAD BREAKAGE



Mill records show that bolster wear may be cut as much as two-thirds by using Sinclair LILY WHITE Oil. This means long bolster life, fewer replacements—low maintenance cost. Also, eliminating package wobble caused by wear reduces thread breakage, gives better assurance of uniform quality of production and maximum output.

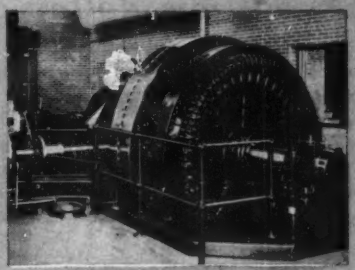
HIGH QUALITY PRODUCTION



Another important advantage of reduced bolster wear is that power costs go down, too. For less wear means less frictional drag. And this lessened drag, multiplied by the number of spindles in the mill, can amount to a big saving in power requirement and cost.

Sinclair LILY WHITE Oils, AX, BX, and CX are specially compounded for low friction loss and lowered power demand. They wash out readily. They are also effective rust preventives.

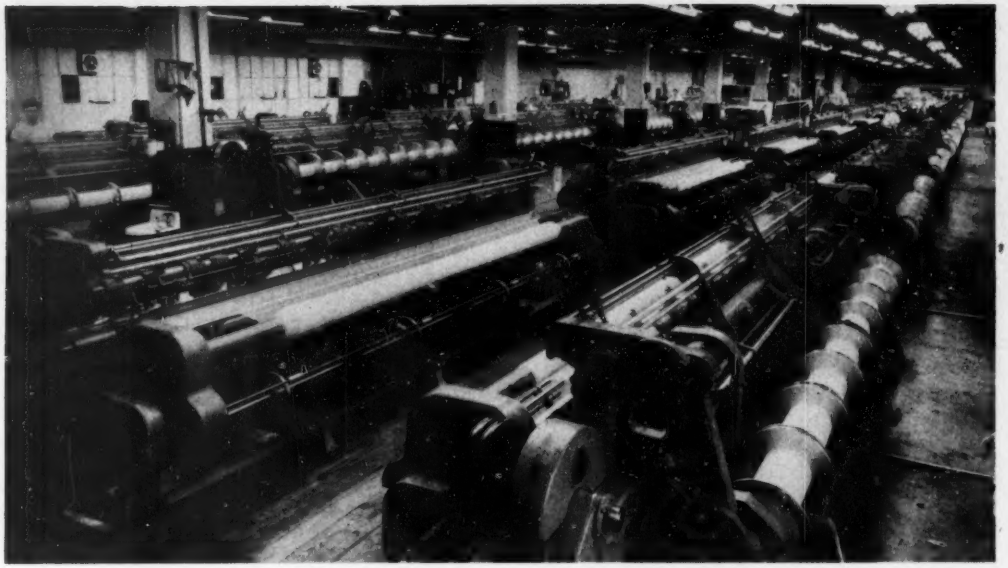
LOW POWER COSTS



To save wear *and* power, use Sinclair LILY WHITE Oils.

LUBRICANTS for the textile industry

For lubrication counsel, see your nearest Supplier of Sinclair Products or write to Sinclair Refining Company, 630 Fifth Avenue, New York 20, N. Y.



BANGOR MILLS ALL-REINER INSTALLATION

96 Reiner Tricot Machines, plus Warpers and Creels, are the core of this important mill's million dollar expansion program.

Long users of Reiner warp knit equipment, the management of Bangor Mills, Inc. based their decision exclusively on past performance of Reiner machines—Tricot Machines, Warpers or Creels. They, if anyone, know how reliable, economical, and versatile Reiner equipment is, and how profitably it serves the ever-expanding tricot market.

To those interested in Tricot fabric production — the fabric with a big future — we extend a cordial invitation to see Reiner Machines in mill action. Write for an appointment or richly illustrated catalogs.

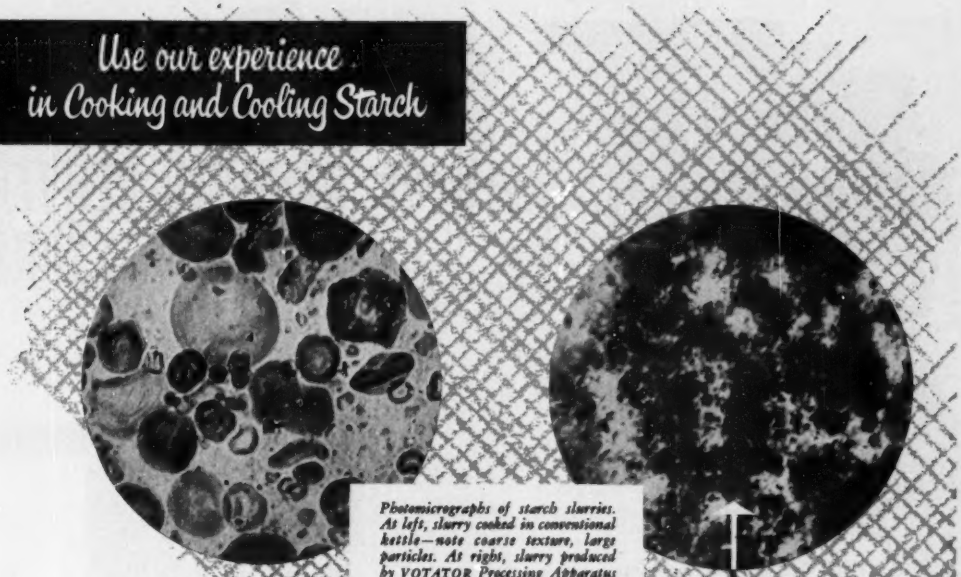
FOUNDED IN 1903

ROBERT REINER INC.

550-564 GREGORY AVENUE
WEEHAWKEN, NEW JERSEY

10 MINUTES FROM TIMES SQUARE. Take Bus Nos. 61 or 67, from Platform No. 60, Port Authority Bus Terminal, 41st Street and 8th Avenue, New York City. Get off at Pleasant Avenue, Weehawken, New Jersey. From there turn left and walk through the underpass up to Gregory Avenue . . . TELEPHONE: UNION 7-0502, 0503, 0504, and 0505. From New York City call LONGACRE 4-6882

Use our experience in Cooking and Cooling Starch



Photomicrographs of starch slurries. At left, slurry cooked in conventional kettle—note coarse texture, large particles. At right, slurry produced by VOTATOR Processing Apparatus—note fully exploded granules, smooth, uniform texture.

improve weavability...
reduce yarn breakage...

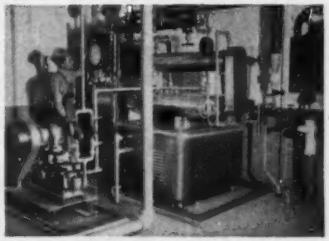
WITH FINER TEXTURE WARP SIZE

A SIZE OF FINER TEXTURE and correct viscosity—as produced by VOTATOR Warp Size Processing Apparatus—penetrates into the warp yarn, lays the fibres smoothly, forms a tough, pliable film. Thus the yarn's resistance to the strain of weaving is increased, breakage and shedding greatly reduced.

In VOTATOR Processing Apparatus, each starch granule is completely exploded and mixed. Size is produced at the exact viscosity desired because precise mechanical control is maintained over all process factors. Less starch is needed, there is less starch for the converter to wash out.

Operation is simple, requires a minimum of labor. Continuous, *fully-enclosed* processing also eliminates spillage and slimy deposits on the floor. And with no open handling, material waste is reduced.

Send the coupon today for complete data on processing finer warp size to help you do a better weaving job. The Girdler Corporation, Votator Division, Louisville 1, Kentucky.



GIRDLER
CORPORATION
Votator Division

VOTATOR T. M. Reg. U. S. Pat. Off.

The Girdler Corporation, Votator Division
224 East Broadway, Louisville 1, Kentucky

Please send bulletin on the following:

- ☐ Warp Size production with VOTATOR Processing Apparatus.
- ☐ Printing Gum production with VOTATOR Processing Apparatus.
- ☐ Backfill production with VOTATOR Processing Apparatus.

Name .....
Position .....
Company .....
Address .....
City ..... State .....

ask that nearby mill

about GARDNER-DENVER RX COMPRESSORS

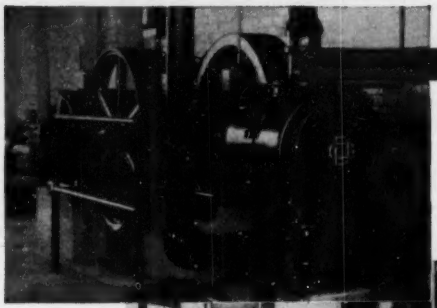
Your Gardner-Denver field engineer will gladly tell you about RX textile mill installations in your area. The chances are there's one nearby — where you can learn firsthand, for example

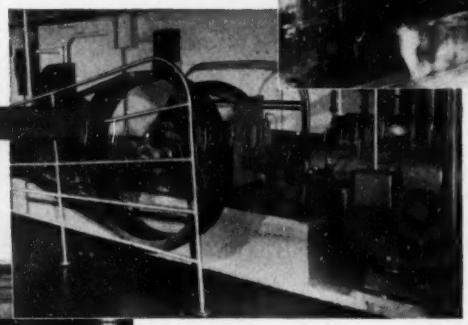
— that RX Compressors are rated highly efficient — because air flows freely through their large valve and port areas.

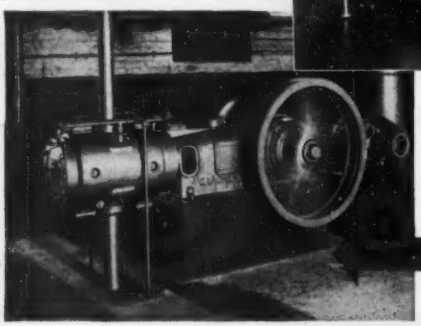
— that they're often called power-misers — thanks to the automatic control that limits power consumption to air demand.

— that maintenance records prove RX Compressors are always ready for round-the-clock service when production demands are high.

Write us for complete information.







SINCE 1859

GARDNER-DENVER

Gardner-Denver Company, Quincy, Illinois

In Canada:

Gardner-Denver Company (Canada), Ltd., Toronto, Ontario

THE QUALITY LEADER IN PUMPS, COMPRESSORS AND ROCK DRILLS

Knoxville, Tenn. Atlanta, Ga. Birmingham, Ala.
Philadelphia, Pa. Washington, D. C. New York, N. Y.
Pittsburgh, Pa. New Orleans, La.

Traditional Blue ...BY MIRON

Accustomed as we are to thinking of blue serge in respect to the boys in the high school graduating class—we're eager to welcome this trim and feminine suit of Miron worsted.

Miron, like so many other mills which "think ahead", calls upon Sandoz for various dyestuffs to meet their high standard of quality. Among the colors selected are the Sandoz METOMEGA chrome colors which they use to insure the long-lasting rich appearance of such fabrics...for METOMEGA means maximum resistance to light and other hazards of wear.

These rugged colors also hold their shade during severe mill treatments like fulling, carbonizing and decatizing. They reduce boiling time by as much as 50% and speed up formula-checking. And they have the unusual property of dyeing loose wool "solid" or free from "tippiness".

And for *any* chrome, acid or direct dyes . . . or auxiliary chemicals . . . for both natural and synthetic fibres ...be guided by the successful "color achievements" you see in these Sandoz advertisements.

DIRECT-DYE COTTON AND RAYON WITH CUPROFIX FOR WASH FASTNESS

New CUPROFIX colors and after-treatment give fastness to washing, light, etc., that formerly required more expensive vat dyeing. Write for booklet on CUPROFIX, already adopted by dozens of mills.

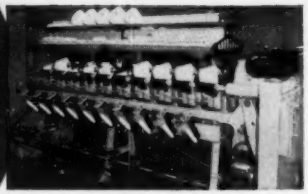
SANDOZ CHEMICAL WORKS, INC., 61 VAN DAM STREET, NEW YORK 13, N.Y.

Application laboratories and stocks at Boston, Philadelphia, Charlotte, Chicago, Los Angeles, Toronto • Other branches at Providence, Paterson and Montreal

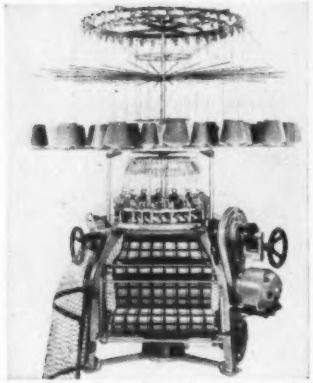
SANDOZ *thinks ahead with textiles*

YARN WOUND ON [illegible]*

Improves Results



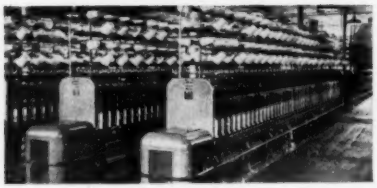
IN THE [illegible]EXT PROCESS



Courtesy Supreme Knitting Machine Company, Inc.

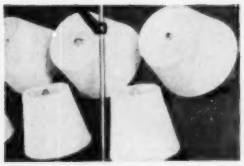
IN THE KNITTING MILL:
Fewer Press-Offs

Many knitters *specify* Roto-Cones because all imperfections have been removed by slubbing to provide perfect running conditions on the knitting machine. The increasing taper allows high-speed delivery without sloughing. And, with less breakage of short fibers, due to the Roto-Coner's* smooth one-piece rotary traverse, the yarn is *loftier*.



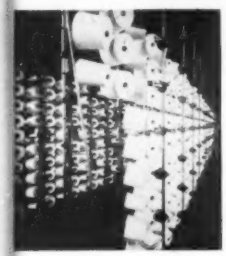
IN THE TWISTING DEPARTMENT:
Doubling Eliminated

Doubling prior to twisting is eliminated when the Universal Roto-Coner* is used in conjunction with Atwood Model 10 Ring Twisters. Single end winding is faster than doubling. The cones (9° 36′, 9° 15′, or 3° 30′) are used as a supply for the Model 10 which, being equipped with single end stop motions, makes preliminary doubling unnecessary.



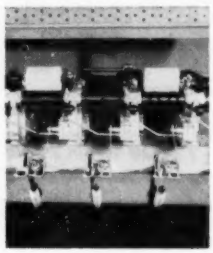
IN THE QUILLING DEPARTMENT:
Improved Quality

Automatic filling winders run without interruption from magazined cones. Accurate inspection, on the Roto-Coner*, of yarn wound from spinning bobbins increases loom efficiency and fabric quality.



IN THE WARPING DEPARTMENT:
Continuous Supply

Maximum warping efficiency can be obtained only from large packages of thoroughly-inspected yarn. Many mills today use Roto-Cones as a supply for their high-speed or jack spool warpers.



IN THE DYEHOUSE:
Even Penetration

Dyers consider that packages wound on the Roto-Coner* are superior for any system of dyeing. Soft packages are wound at 325 to 500 ypm with uniform density throughout and from spindle to spindle.

ROTO-CONER*
THE FLEXIBLE WINDER

The Roto-Coner* winds a complete range of staple yarns onto a variety of package shapes and sizes. Rotary traverses are made in four standard groove arrangements and from either Bakelite or cast-iron.

UNIVERSAL WINDING COMPANY

P. O. Box 1605 • Providence 1, R. I.

Boston, Philadelphia, Utica, Charlotte, Atlanta, Chicago, Los Angeles; Montreal, Hamilton, Canada; Manchester, England; Paris, France; Basle, Switzerland

Agents in every principal textile center throughout the world

ROTO-CONER* WINDER *The Textile Winder with the Rotary Traverse*

An increase in spindle oil viscosity means an increase in power consumption...

Gulfspin maintains its original viscosity even after extended service

Dirt, water, and oxygen act to thicken ordinary spindle oils, appreciably increasing their viscosity during normal spinning room service. Because of this higher viscosity, an increase in frictional resistance occurs and power consumption is increased proportionately. Result: power costs that are higher than necessary.

But this is not the case in spinning rooms where Gulfspin is the spindle lubricant. Service tests demonstrate that Gulfspin does not undergo any appreciable increase in viscosity, even after extended service. Thus substantial savings in power costs are possible with this outstanding oil.

Gulfspin has many other characteristics which make it effective for spindle lubrication; it is not only resistant to the formation of sludge, but also prevents sludge from depositing on spindle shafts and bolsters—thus keeps spindles extra clean; it reduces wear because of excellent oiliness characteristics; and helps effectively to protect spindle parts against rust.

See for yourself on your frames that this new spindle oil is better in every way. Write, wire, or phone your nearest Gulf office and ask a Gulf Lubrication Engineer to call. Gulf Oil Corporation · Gulf Refining Company, Gulf Building, Pittsburgh 30, Pennsylvania.

FIFTY YEARS OF SERVICE
1901 GULF 1951
PETROLEUM AND ITS PRODUCTS

READER PREFERENCES IN THE TEXTILE FIELD

(As expressed by mill executives)

Ranking of 6 Textile Publications in Order of Value to Mill Executives

A 31% return from 1701 textile executives, in as many mills, ranks T.I. first with a total almost equal to the next three publications combined, in the industry's most recent reader survey.

The returns: for T.I.—234; for Publication B—131; for Publication C—75; for Publication D—42; for Publication E—27; for Publication F—20.

The comparative ratio is shown in the graph. Weight of preference for TEXTILE INDUSTRIES is a striking indication of its leadership and wide acceptance throughout the industry.

ON SEPTEMBER 2, 1949, a nationally-known firm of accountants conducted a readership survery among 1701 textile mill executives to determine *impartially* what industry publications were of most value in providing helpful information on mill operations.

From a 31.1% response received, TEXTILE INDUSTRIES was ranked first by 234 readers, while the second and third publications together had a total of 206. The questionnaire was mailed to the superintendent or another executive of every mill listed in Clark's Directory of Southern Textile mills.

This directory was used because it lists only those mills that are strictly textile manufacturing plants.

These mills have 64% of the country's total spindles, 62% of the looms, 55% of the knitting machines—consume nearly 70% of the total fibers of all kinds and account for 63% of all textile purchases. With the South recognized as the dominant and most rapidly expanding textile section in the United States, it is significant that the mills prefer TEXTILE INDUSTRIES almost two-to-one over any other textile publication—that over 85% of the mills responding regularly read TEXTILE INDUSTRIES and find it of value in their operations.

The acceptance enjoyed by T.I., not only in the South, but in the nation-wide textile industry, grows naturally from its practical editorial service to production and management men. Month after month and year after year T.I. has worked steadily to give its readers the kind of special help and information they cannot find elsewhere. The inevitable consequence of this policy is that today T.I. has the largest mill circulation in the United States.

TEXTILE INDUSTRIES is edited for the Production and Management Men in the Textile Industry

Ashworth
CARD CLOTHING

Fall River, Worcester, Greenville and Philadelphia . . . four of a kind that can't be matched as a source of continuous supply of card clothing and similar products. These four widely separated Ashworth factories are your guarantee of dependable delivery.

But it's also good to know that when you specify Ashworth you're getting consistently high quality also — resulting from over 90 years' experience in cards and card clothing by one family.

To profit from that experience . . . to make your cards more efficient . . . ask us about the free Ashworth Surveys — today.

ASHWORTH BROS., INC.

American Card Clothing Co. (Woolen Division)

Fall River *†‡ Worcester *‡ Philadelphia*†‡ Atlanta†‡
Greenville*†‡ Charlotte†‡ Dallas†‡ (Textile Supply Co.)

Factory* Repair Shop† Distributing Point‡

PRODUCTS AND SERVICES

Card Clothing for Cotton, Wool, Worsted, Silk, Rayon and Asbestos Cards and for All Types of Napping Machinery. Brusher Clothing and Card Clothing for Special Purposes. Lickerin Wire and Garnet Wire. Sole Distributors for Platt's Metallic Wire, Lickerins and Top Flats Reclothed.

4 FACTORIES . . . **6** REPAIR SHOPS . . . **7** DISTRIBUTING POINTS

MORE PROFIT

with Taylor Dye Machine Control!

THE Dexdale Hosiery Co., (below) of Lansdale, Pa., reports *higher profits* since installing Taylor Automatic Dye Machine Control. Yes, those Taylor Fulscope* Temperature Controllers with Process Timers are helping Dexdale realize higher profits in at least three ways:

1. Uniformity of shades never before possible. Fewer rejects—fewer re-dyes!

2. Steam Saving because exactly enough—no more—is used to maintain required temperature in each dye machine.

3. Less Operator Responsibility. Operator merely sets a dial, then is free for other duties until signal light flashes.

THE SYSTEM WORKS LIKE THIS:

A. Desired dyeing temperature is set by outside adjustment knob.

B. Time for dyeing cycle is set on time dial (top left on each instrument).

C. Steam is automatically turned on, quickly bringing vat up to set temperature. Once set temperature has been reached, automatic timing starts, controlling the process at that temperature for length of time pre-set on dial in step *A*.

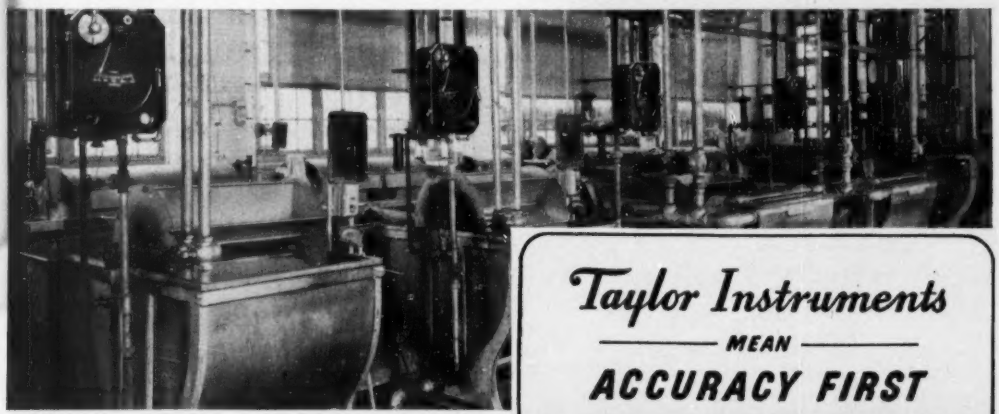
D. At the end of that time, steam is automatically shut off and signal light informs operator that the dyeing cycle has been completed.

* * *

All this adds up to keeping quality *consistently uniform* and costs at a minimum. We'd like to help *you* do this by solving your processing problems with accurate, automatic Taylor control. Ask your Taylor Field Engineer! Or write Taylor Instrument Companies, Rochester, N. Y., or Toronto, Canada. *Instruments for indicating, recording and controlling temperature, pressure, humidity, flow and liquid level.*

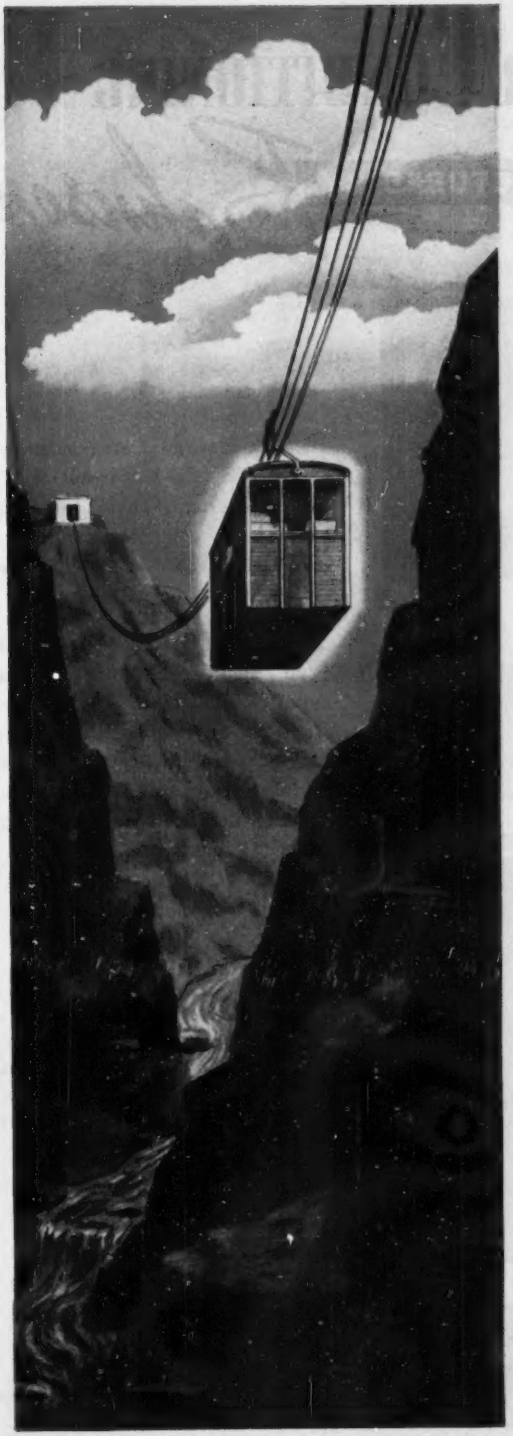
Taylor's Centennial — Accuracy First — Since 1851

*Registered Trade-Mark



A few of the many Taylor-Controlled dye machines at Dexdale Hosiery Co., Landsdale, Pa.

Taylor Instruments
MEAN
ACCURACY FIRST
IN HOME AND INDUSTRY



SAVES TIME AND TROUBLE

In rugged terrain the little cable car is a godsend in avoiding hazards—saving time—spanning dangers and obstacles.

Likewise, in finishing and dyeing operations, Diastafor de-sizing agents—Types L, LC and D—save you time and trouble, and help to overcome the varied difficulties that arise unexpectedly in almost every lot.

Diastafor helps iron out the problems created by variables in water and in sizing formulas, because it works so well in a wide temperature and pH range—a range that meets every enzyme de-sizing requirement.

Diastafor gives peak performance on rayons, cottons or mixed goods. It helps provide a good finish for even dyeing, with no streaks or blemishes. It assures exceptional results in the continuous process.

Diastafor is always dependable. With men in charge of finishing operations, it has been the favorite for more than 40 years. Its wide acceptance has been earned by providing easy, fast, economical de-sizing, and good results even on the hardest lots you have to dye.

Let us show you how Diastafor can help save you time and trouble in your finishing. Our sales and technical staffs are always eager to be of help. Address Standard Brands Incorporated, *Diastafor Department*, 595 Madison Avenue, New York 22, New York.

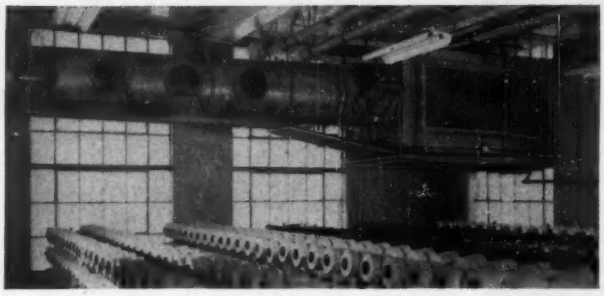
DIASTAFOR

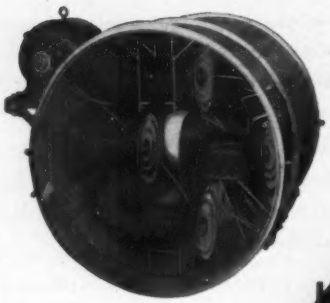
A TRADE MARK OF STANDARD BRANDS INCORPORATED

TEXTILE AIR CONDITIONING

ENGINEERED and MANUFACTURED BY *Bahnson*

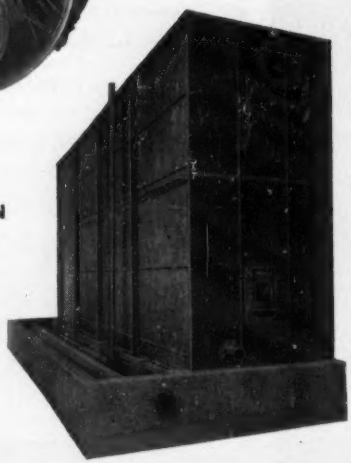
HUMIDUCT UNIT SYSTEM





CENTRISPRAY WASHER SYSTEM

CENTRAL STATION AIR WASHER SYSTEM



Bahnson designed air conditioning systems are the result of 40 years experience in engineering equipment for humidity and temperature control in the textile industry.

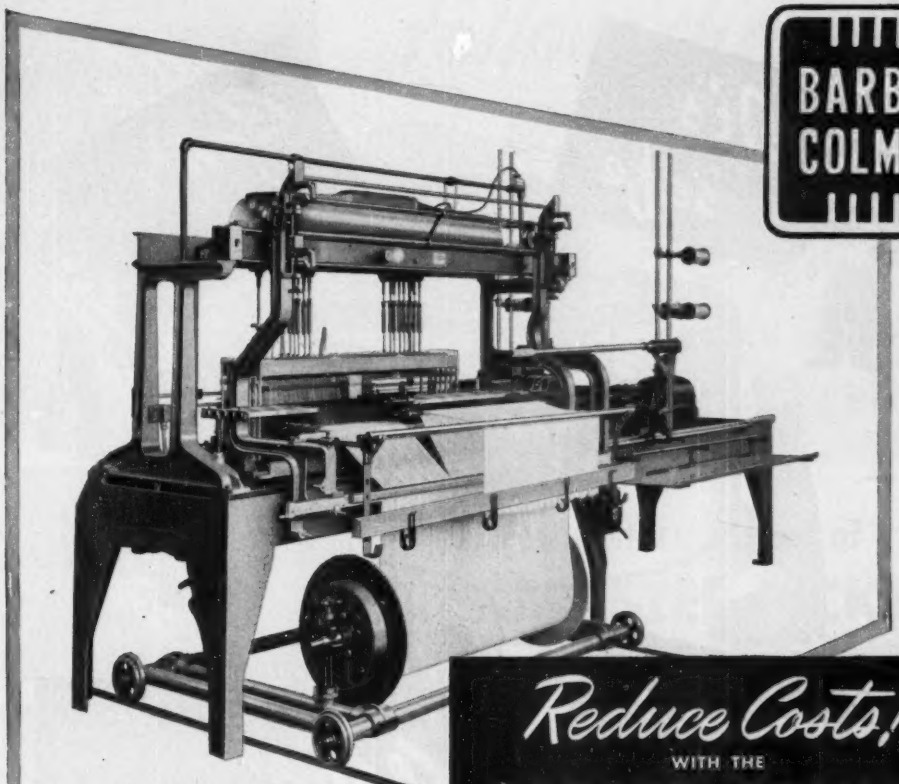
To meet the demands for varied type plants handling various types of fibers, the Bahnson Company has developed and manufactured equipment and systems widely recognized for both economical first costs and operating costs.

Let us discuss your particular problem and present recommendations based on experience, for the air conditioning system best suited for your specific requirements.

Bahnson Company

ENGINEERS AND MANUFACTURERS

WINSTON-SALEM, N. C.



BARBER COLMAN

Reduce Costs!

WITH THE

BARBER-COLMAN DRAWING-IN MACHINE

★ VERSATILE...

★ ACCURATE...

★ EFFICIENT...

DRAWS IN HEDDLES, DROP WIRES, AND REED IN ONE OPERATION

Many mills today are running such a variety of weaves, patterns, and stripes that the drawing-in operation becomes a major cost item. *Substantial savings* can be made by the use of a Barber-Colman Drawing-In Machine. This machine will handle any plain, fancy, or dobby weave. It draws-in all the heddles, drop wires, and reed in *one* operation — automatically selecting the proper heddle, drop wire, and reed dent for each thread. Any form of skip draw can be handled as easily as straight sequence, and the draw can be made from either a flat sheet or leased warp. The machine is available in a variety of capacities, drawing as many harness and banks of drop wires as required. Variations in size will take care of all standard loom widths. Modern mills of any size can take advantage of the versatility, accuracy, and efficiency of this outstanding machine to effect important savings in what has been a slow and costly hand operation. Consult your Barber-Colman representative for a discussion of possibilities in your own mill.

AUTOMATIC SPOOLERS • SUPER-SPEED WARPERS • WARP TYING MACHINES • DRAWING-IN MACHINES

BARBER-COLMAN COMPANY

ROCKFORD • ILLINOIS • U. S. A.

FRAMINGHAM, MASS., U. S. A. GREENVILLE, S. C., U. S. A. MANCHESTER, ENGLAND MUNICH, GERMANY

...the most delicate fabrics

The inside of the "Whirlwind's" basket is absolutely smooth. From top to bottom, there are no rivets, no flanges or other projections. So, even the sheerest fabrics can be handled safely. Yet the "Whirlwind" is rugged in construction.

Fast acceleration, quick stopping, easy loading and unloading, all combine with highest running speeds (up to 1200 R.P.M.) to provide greatest production, per batch, per hour, per day.

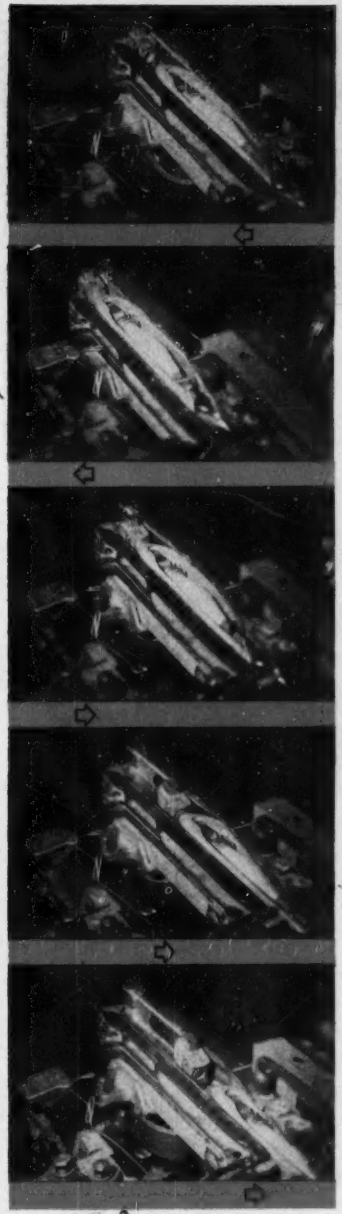
6 BIG "WHIRLWIND" FEATURES

- Easier and faster loading and unloading
- Smooth, rapid acceleration to reach maximum speed and efficiency
- Highest running speed — thorough extraction
- Automatic hydraulic brake with Finger Tip Control for smooth, safe stops
- Rugged construction to take hard service with minimum maintenance and repair
- Greater Stability; effective self-balancing.

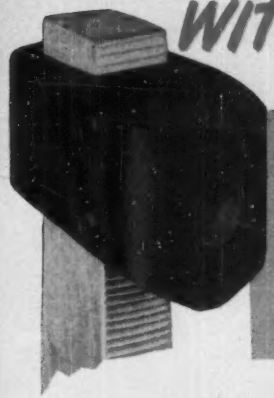
Send for complete descriptive bulletin

FLETCHER WORKS

225 GLENWOOD AVE. PHILADELPHIA 40, PA. ESTABLISHED 1850



Follow-thru with Leather



Follow-thru action of

PICKMASTER PICKERS

assures swift, smooth shuttle flight

"Follow-thru is the secret of the hard, fast ball into the bleachers — *and the same holds true in the swift, straight flight of a shuttle across the raceplate.*

These "frozen-action" (stroboscopic) photographs — taken in 1/20,000th of a second on a Draper X2 Loom at 175 picks per minute! — prove that the PICKMASTER Leather Picker *does not bounce the shuttle!* Instead, it makes a perfect catch of the shuttle spur in the precision hole and throws the shuttle with a long sweeping follow-thru that carries it swifty and smoothly into the other box.

Leather does not retain and build up heat — shuttle spurs remain relatively cool and shuttles last longer. Construction is accurate, well balanced — picker and stick work as one. The "life saver" hole is literally a shuttle life saver, correct in bore and located to keep the shuttle nose down. The finish is smooth — cannot catch fine filament . . .

Follow-thru with Leather! Remember no substitute material can give you all these advantages, yet you need *all* of them to get top quality and high production.

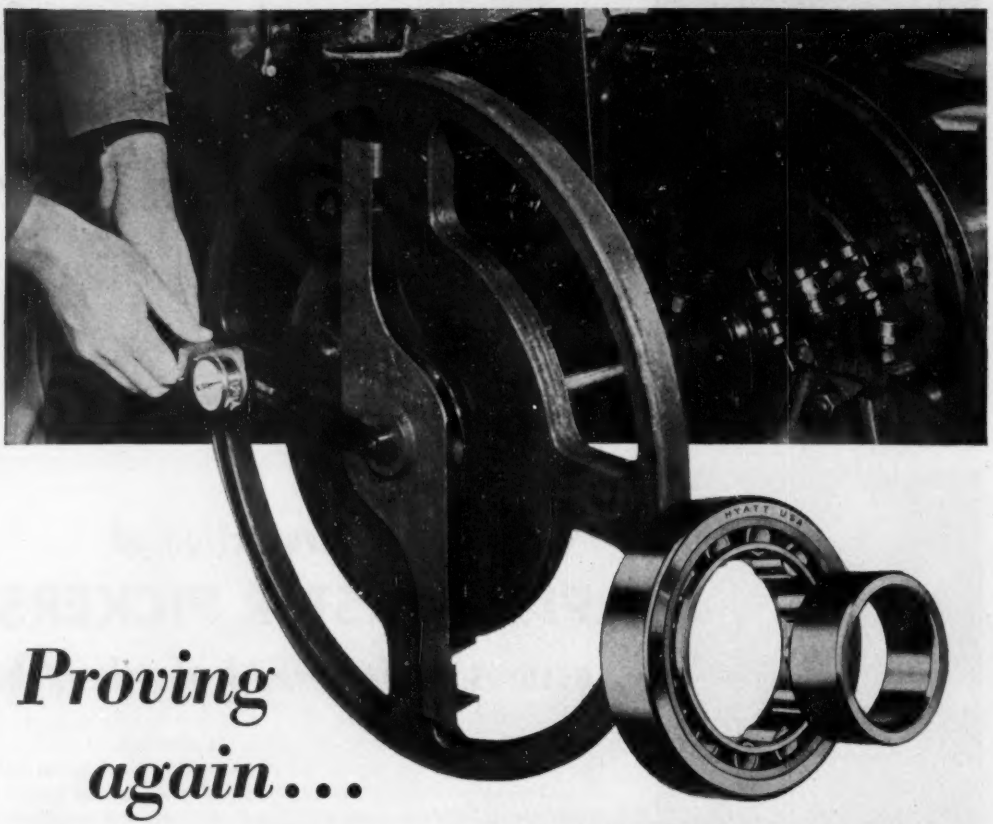
The new catalog of G&K-DIXIE Textile Leathers proves with high speed photographs that it pays to *Follow-thru with Orange Line Loom Leathers.* Send for it.

100 YEARS OF SERVICE TO INDUSTRY
GRATON AND KNIGHT
DIXIE LEATHER CORPORATION

Pickmaster® Pickers

FAMOUS ORANGE LINE TEXTILE LEATHER

GRATON & KNIGHT COMPANY, WORCESTER, MASS. • DIXIE LEATHER CORPORATION, ALBANY, GEORGIA Affiliate



Proving again...

"It's easier with HYATTS"

Two groups of identical looms, one equipped with Hyatts, the other plain bearings, were used for a test to determine the difference in effort required to turn them over with the hand wheel.

A standard dial indicating type of torque wrench attached to the loom crankshaft, was used to record the effort or torque in inch pounds to turn the loom over. More than nine hundred readings were taken to arrive at the results, which clearly show that only one-half as much effort is required to turn over Hyatt-equipped looms by hand.

This means that it's easier for the weaver—less fatigue—less danger of injury—the pick-out operation more quickly completed. Women weavers particularly appreciate Hyatt-equipped looms.

Make sure that your new looms have Hyatt Roller Bearings throughout for increased production and improved quality with less effort. Hyatt Bearings Division, General Motors Corporation, Harrison, New Jersey.

HYATT ROLLER BEARINGS

call National Aniline now for formulas and colors on

OLIVE GREEN #107
(cotton)

OLIVE GREEN #108
(wool)

National Technical Service can give you immediate assistance on the National Dyes to meet the special requirements of the Quartermaster Corps on these new colors.

For prompt service on the formulas and dyes you will need on military orders, write, wire or phone our nearest office.

NATIONAL ANILINE DIVISION

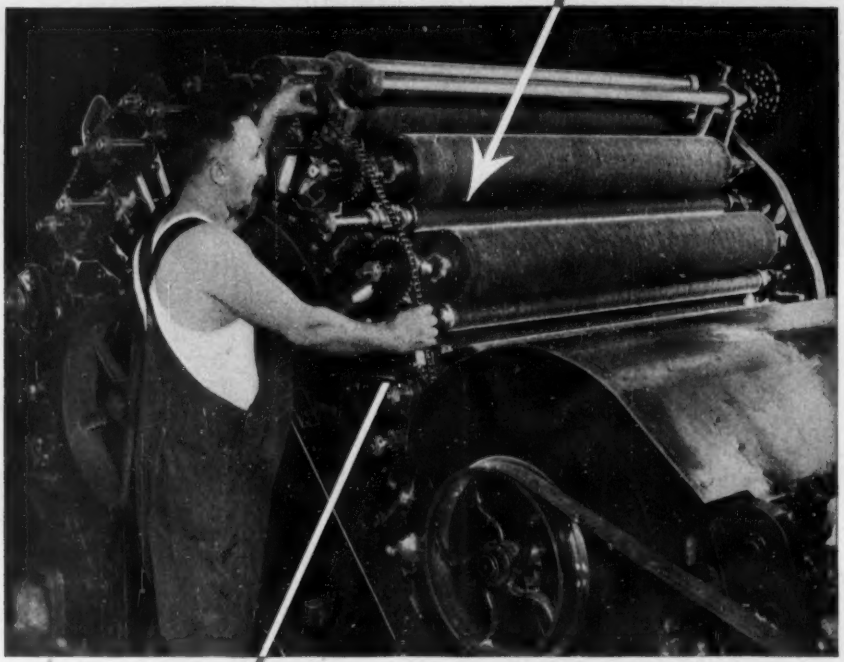
ALLIED CHEMICAL & DYE CORPORATION

40 RECTOR STREET, NEW YORK 6, N.Y. • BOwling Green 9-2240

Boston 10, Mass., 140 Federal St.	CApitol 7-9450	Richmond 19, Va., 8 North Fifth St.	Richmond 7-1531
Providence 3, R.I., 15 Westminster St.	DExter 1-3400	Columbus, Ga., Columbus Interstate Bldg.	Columbus 3-1520
Philadelphia 6, Pa., 240-294 S. Front St.	WAlnut 3-5382	Greensboro, N.C., Jefferson Standard Bldg.	Greensboro 2-2514
San Francisco 5, Cal., 617 Howard St.	DOuglas 1-2582	Chattanooga 2, Tenn., James Building	Chattanooga 5-2547
Portland 9, Ore., 736 West Burnside St.	BEacon 1853	Atlanta 2, Ga., 148 Peachtree St.	CYpress 2021
Chicago 54, Ill., The Merchandise Mart	SUperior 7-2567	New Orleans 10, La., 714 Carondelet Building	Raymond 7234
Charlotte, 1 N.C., 201-203 West First St.	Charlotte 3-5221	Toronto 2, Canada, 137-143 Wellington St. W.	Elgin 8484

A CARD IS NO BETTER THAN ITS

CARD CLOTHING



That's why a relatively small investment in Tuffer Card Clothing gives such a handsome return. Its uniform, precise construction permits the carder to make the most of his skill and get **full production** from the carding machines.

Tuffer is the **proved** card clothing . . . proved in woolen and cotton mills throughout the industry. Specify it on your next order . . . let it prove itself on your cards.

HOWARD BROS. MFG. CO. WORCESTER 8, MASSACHUSETTS

Southern Plants: Atlanta, Ga. and Gastonia, N. C.

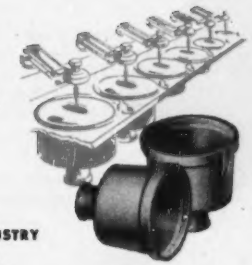
Branches: Philadelphia, Pa. and Blanco, Texas *Direct Representation in Canada* A-2

TUFFER CARD CLOTHING

IMPROVES PRODUCTION ALL ALONG THE LINE

In many places in your production

micarta is basic!



TEXTILE INDUSTRY

Lap rolls, pirns, picker-sticks, shuttles . . . MICARTA® is handling more and more of these key textile jobs better and longer than either metal or wood. MICARTA is a basic material. It is lighter than aluminum . . . pound for pound this plastic has a compressive strength greater than structural steel. It cannot rust.

MICARTA will not fuse. It kills noise and absorbs vibration. It can be machined, formed or fabricated easier and more economically than metal.

MICARTA is part of the textile future. Explore its possibilities in your plant. Westinghouse Electric Corporation, Micarta Division, Trafford, Pennsylvania. J-06444

MICARTA is paying its way. As a basic material it can serve the textile industry in rings, separators, guide rollers, spools, bobbins, shuttles, rolls, bearings, inspection forms and tables, pulleys, picker-sticks.

In fact, wherever tough, light and even-wearing parts are a "must" to production, there you will find a place for versatile MICARTA.

Where quality is the first consideration in a fabric there is no substitute for

Celanese®

Acetate Rayon Yarn

*Reg. U. S. Pat. Off.

CELANESE CORPORATION OF AMERICA, 180 MADISON AVENUE, NEW YORK 16, N. Y.

ARE WE GETTING OUR NOSE IN YOUR BUSINESS

. . . IF WE ARE, YOU'RE GETTING SMOOTHER, STEADIER SPINDLE OPERATION WITH RCK FLYER PERFECTION

If it's spinning efficiency you want, the condition of your flyer noses can make a powerful dollars-and-cents difference. That's why Ideal Machine Shops includes "nose conditioning" in its complete flyer rebuilding service.

Straightening noses is, to be sure, a minor part of the super-service which Ideal gives to flyers. There's precision swaging and taper reaming for perfect flyer-spindle fit . . . SELECTO SPEED balancing, to give each flyer perfect balance at individual mill speeds . . . your choice of the famous RCK rust-resistant finishes. Even with all these, a crooked, damaged flyer nose *could* jerk and ruin your roving—but Ideal fixes noses good as new.

Ideal's expert, conscientious attention to *every detail* of *every job* is saving money and improving quality for mill men throughout America. Let us do the same for you.

For best results . . . We recommend that you have flyers and spindles rebuilt at the same time, to assure perfect fit and eliminate vibration. Ask about our spindle repair service.

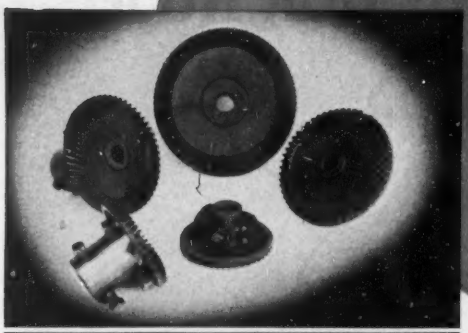
IDEAL MACHINE SHOPS, INC.

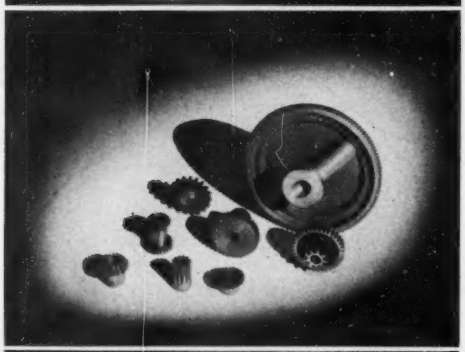
Phones 4161 and 4391

BESSEMER CITY, NORTH CAROLINA

27TH YEAR OF CONTINUOUS SERVICE TO TEXTILE MILLS

PRECISION MADE





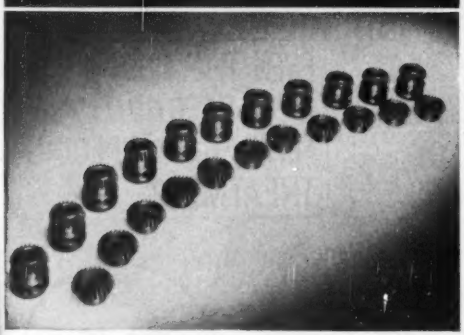


Plate and Coupling Gears
Card Coiler Gears
Bobbin and Spindle Gears

Gear manufacture is not a simple foundry casting problem. Demands for long life—superior performance—efficient service, call for precise engineering in the process.

Gears by Southern States give longer, smoother, more efficient operation because they fit accurately, mesh easily, reduce chatter and vibration. This superior performance of Southern States machine-molded cast-tooth gears and precision-machined cut-tooth gears is achieved through modern metallurgical and foundry practices to assure uniformity of specifications. Accurate machining and rigid inspection assure maximum operating efficiency. Southern States products are guaranteed by an experience gained from thirty years of service to many of the South's leading textile mills.

Southern States Bobbin and Spindle gears, Plate and Coupling gears, and Card Coiler gears to fit all frames. Submit samples, drawings or specifications for quotations.

QUANTITY PRODUCTION OF CAST-TOOTH GEARS. CUT-TOOTH GEARS FROM 2 TO 32 DP.

Southern States Equipment Corp.

HAMPTON GEORGIA

Representatives - Mechanical Division

William A. Knapp, Atlanta, Georgia
John C. Walters, Hampton, Georgia
Roy Schrimshire, Columbus, Georgia
F. C. Todd, Inc., Gastonia, N. C.
Mathews Equipment Co., Providence, R. I.
C. H. Kennington, Charlotte, N. C.
Textile Parts & Machine Co., Gastonia, N. C.

Largest Manufacturer of Cast-Tooth and Cut-Tooth Gears in the South

"Hosiery merchandising begins with good knitting",

says HARRY KIMMELMAN, hosiery buyer, McCreery's, New York.

As every experienced hosiery buyer knows, good knitting is an *essential* in creating brand acceptance and building brand preference. And good needles are *essential* in producing good knitting. This is one of the reasons why so many leading mills use

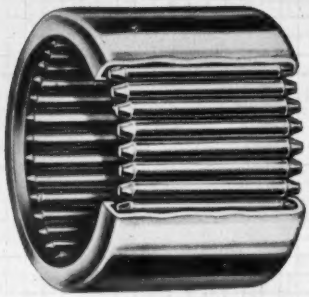
TORRINGTON

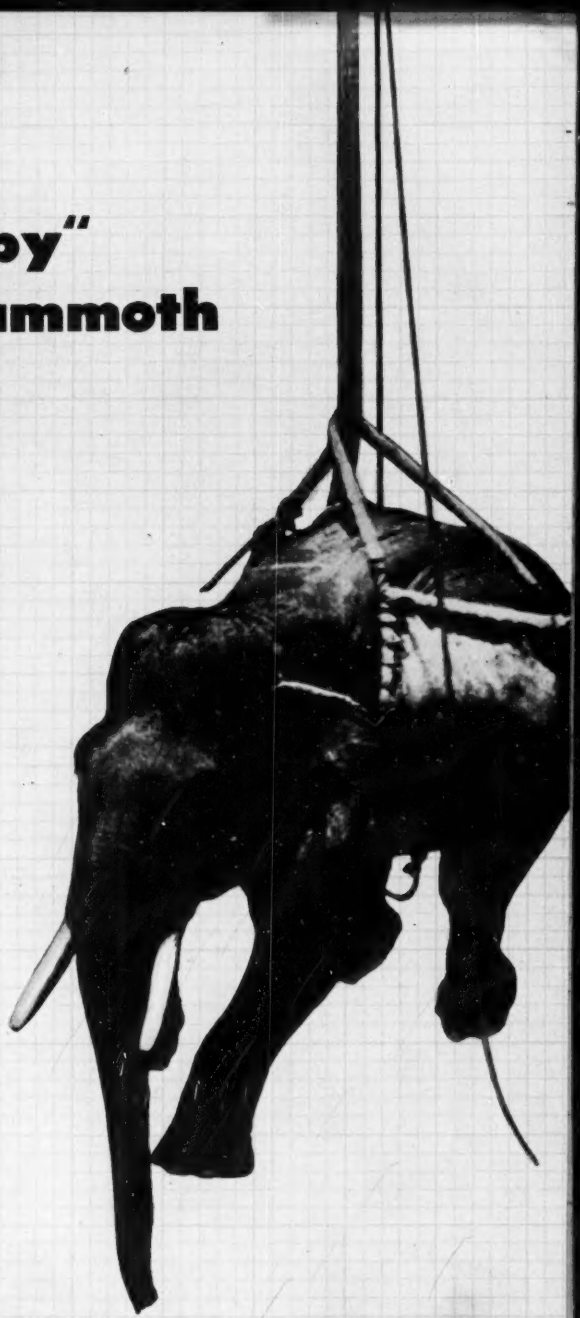
SPRING BEARD NEEDLES · SINKERS · DIVIDERS · SPLIT DIVIDERS

THE TORRINGTON COMPANY, Torrington, Conn., U. S. A.
Established 1866

Branches: New York • Philadelphia • Chicago • Greensboro, N. C. • Boston • St. Louis Toronto, Canada • *Pacific Coast Representative:* E. G. Paules, 1762 West Vernon Ave., Los Angeles 37, California. Broadgate House, 7-10 Eldon St., London E. C. 2, England

how to "baby" a mammoth





The way to handle a big load smoothly and easily with the smallest possible anti-friction unit is to use a Torrington Needle Bearing. The Needle Bearing has a higher radial capacity than any other anti-friction bearing of comparable size. We will be glad to show you what this can mean in terms of the compactness, capacity, life expectancy and all 'round performance of your equipment.

THE TORRINGTON COMPANY

Torrington, Conn. • South Bend 21, Ind.

District Offices and Distributors in Principal Cities of the United States and Canada

TORRINGTON *NEEDLE* BEARINGS

NEEDLE • SPHERICAL ROLLER • TAPERED ROLLER • STRAIGHT ROLLER • BALL • NEEDLE ROLLERS

STAYS WHITER because it STARTS WHITER!

INTERIOR SURFACES STAY CLEANER . . LONGER . . WITH KEM SAVE-LITE . . THE WHITER WHITE!

How long white paint *stays* white—and *how* white it stays—depends, in part, on *how white it is to start with.*

Sherwin-Williams KEM SAVE-LITE Finishes for mill interiors cut upkeep costs because their brilliant whiteness both starts higher and stays higher in light reflection value. These facts are borne out not only in laboratory tests, but in year-after-year experience in leading textile mills the country over.

Test KEM SAVE-LITE for yourself against any conventional mill white finish. See the difference—in initial whiteness—in hiding power—in greater covering capacity. Call your Sherwin-Williams representative for a demonstration, or write The Sherwin-Williams Co., Cleveland 1, Ohio. (Division offices, Charlotte, N. C. and Boston, Mass.)

Types to Meet Varying Requirements

Sherwin-Williams Save-Lite is supplied in several types to meet varying operating conditions, both in oil type (Save-Lite) and synthetic (Kem Save-Lite). Gloss finish gives extreme ease of cleaning; Eg-Shel greatest diffusion and reflection of light. Fume and moisture-resisting types give added resistance where chemical fumes, moisture and heat are encountered.

SHERWIN-WILLIAMS
INDUSTRIAL MAINTENANCE FINISHES

SAVE-LITE MILL WHITE • COLOR HARMONY FINISHES
MILL VILLAGE PAINTS

SPECIALISTS IN DEXTRINIZATION AND BLENDING OF TAPIOCA, POTATO, CORN AND ALL STARCH PRODUCTS....

How to Get the ONE BEST Dextrine or Starch Product!

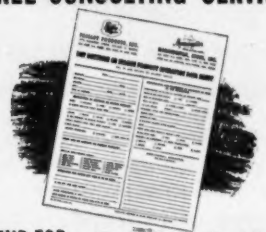
ONE OF SIX MORNINGSTAR LABORATORIES

MORNINGSTAR has developed Textile Dextrine and Starch Products to the highest known standards of performance! Skilled chemists, thru years of continuous research, have achieved a degree of uniform excellence in *all* Morningstar Dextrine and Starch Products, unapproached in the history of the industry.

Modern, scientific laboratory facilities and techniques have been established not only to *improve* but to maintain absolute *control* of quality. Now you can depend upon each succeeding shipment containing the same, fine uniform characteristics. Don't guess. Don't take chances on the Dextrines you use. Morningstar *Scientific* Dextrine and Starch Product Service can give you valuable aid. Tell us about your needs. Let our laboratory staff determine the one best formula for your specific requirements. Call our nearest field man or write us today.

The PAISLEY PRODUCTS Division of Morningstar, Nicol, Inc. is prepared to give you quick, efficient service on all Morningstar products. Consult your telephone red book. PAISLEY maintains sales and service organizations in most principal cities.

FREE CONSULTING SERVICE!



SEND FOR our "Dry Dextrine or Starch Product Operation Data Sheet." *Fill in and return it promptly. Our laboratory staff will gladly study your requirements and promptly recommend the one best and most economical formula to improve the specific operation you describe. This valuable laboratory service does not cost you one penny! Take advantage of it NOW!*

ESTABLISHED 1851

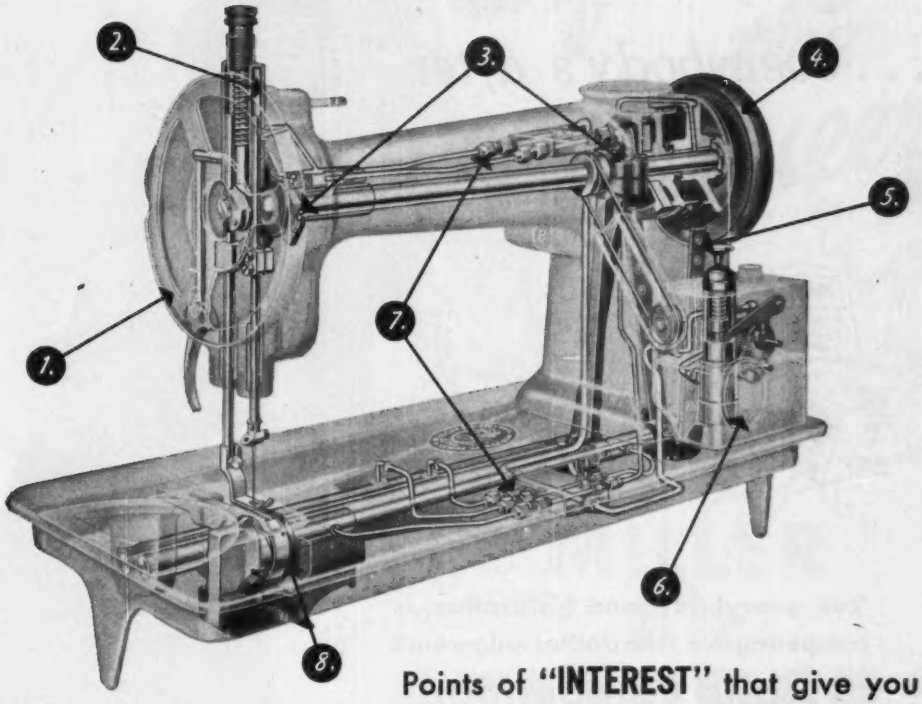
Morningstar

SCIENTIFIC DEXTRINE AND STARCH PRODUCT SERVICE

MORNINGSTAR, NICOL, INC.

630 WEST 51st STREET, NEW YORK 19, NEW YORK

1770 CANALPORT AVENUE, CHICAGO 16, ILLINOIS



Points of "INTEREST" that give you

A HIGHER RETURN ON YOUR INVESTMENT

in a "W&G" Type 10-A Lockstitch Machine

1. Rotary Thread Take-up, with instant adjustment for light, medium, or heavy thread. Saves operator's time — contributes to increased output.

2. Air Cushioned Needle Bar — assures smoother, quieter, high-speed operation with increased life of needle-bar bearings.

3. Replaceable Bearings for all shafts and bars — eliminate need for oversize parts and save time and expense of maintenance.

4. Safety Hand Wheel with improved web construction and deep belt groove that prevents accidental contact with belt hook.

5. Heavy-Duty Belt Drive, designed for extra long life at sustained high speeds. Eliminates back-lash common to gear drives.

6. Fully Automatic Lubrication, with belt-driven, force feed oil pump. Eliminates all manual oiling, saves operator's time, and increases machine life many fold.

7. Metered Oil Flow supplies the right amount of filtered oil to each bearing, according to its speed and load. Permits continuous operation at highest speeds without overheating.

8. Floating Bobbin Case requires no lubrication — prevents danger of oily threads and spoiled garments.

YES, in *every way*, this "W&G" Lockstitch Machine is designed and built to give many extra years of trouble-free service — to help you get increased production at minimum overall cost. For complete information, write for your free copy of Bulletin 886.

WILLCOX & GIBBS
Sewing Machine Co.

214 West 39th St., New York 18, N.Y.

Gee, am I popular? . . . everybody's after my money!

Yes, everybody (and his brother) is competing for her clothes-allowance

. . . and Competition begins in the Weaveroom!

She's a tough customer, and getting tougher all the time. She knows how to get the last whisper of quality to the last fraction of a cent. And she shops till she gets it!

So it's no happenstance that the major part of her wardrobe is cut from cloth woven in mills equipped with modern, high-speed, automatic C&K Call Box Looms.

For C&K Call Box Looms are quickly convertible and widely adaptable to meet her fast-changing whims. They weave high-quality fabrics at low cost . . . and in quantities that pay profits in any price-situation.

Yes, a modern C&K Weaveroom . . . kept at top operating efficiency with Certified C&K Loom Parts . . . *is a successfully competitive weaveroom.*

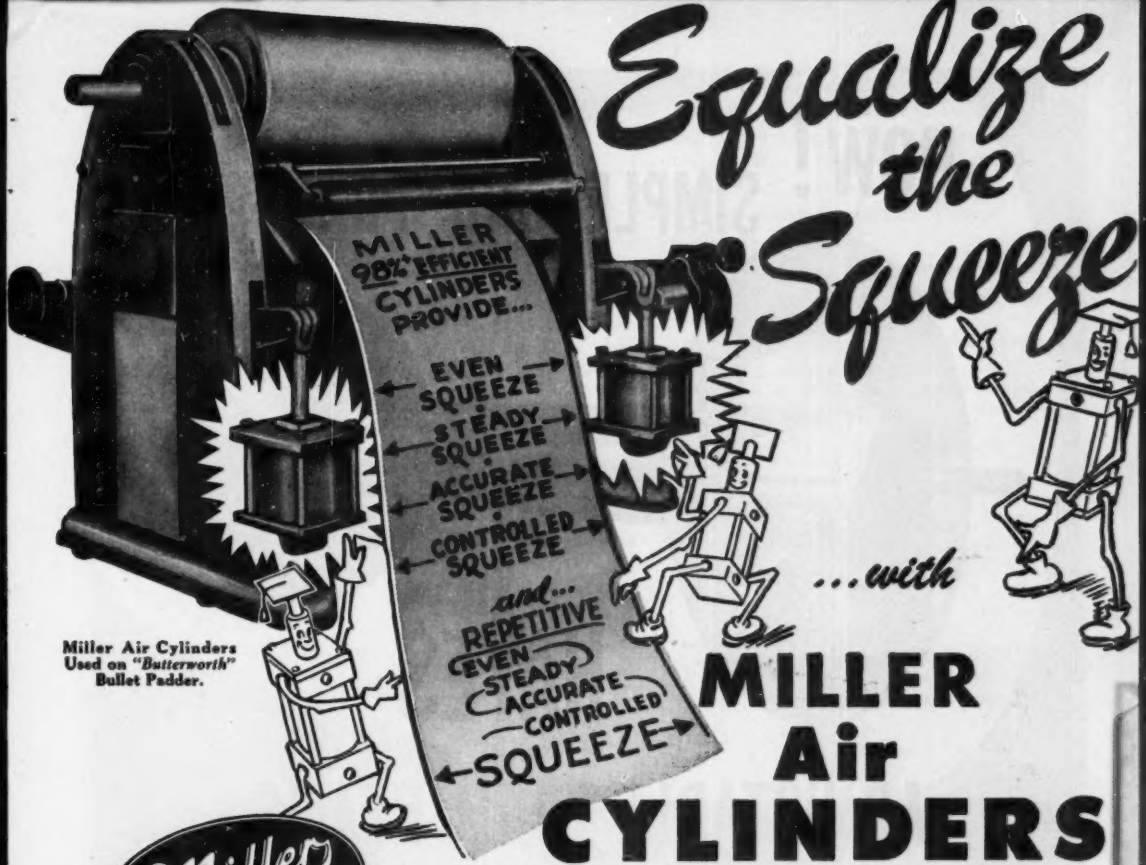
This "Invisible Trademark" Stands Back of the Trademarks of the World's Finest Woven Fabrics

Crompton & Knowles LOOM WORKS

WORCESTER 1, MASSACHUSETTS, U. S. A.

PHILADELPHIA, PA. • CHARLOTTE, N. C. • ALLENTOWN, PA. • CROMPTON & KNOWLES JACQUARD & SUPPLY CO., PAWTUCKET, R. I.

Equalize the Squeeze



Miller Air Cylinders Used on *"Butterworth"* Bullet Padder.

...with

MILLER Air CYLINDERS

Miller Air Cylinders economically provide the steady, even, repetitive "squeeze" so essential for the pressure rolls of textile machinery and equipment.

Precision-accurate adjustment and repetitive application of pressure to always the exact degree desired are assured by the high-efficiency leakproof operation of these cylinders and the extremely low "break away" pressures required to obtain smooth piston movement. Even when the operating plant air pressure is again applied after days of machine inactivity, piston movement is instantaneous—smooth- -chatter free . . . because the Miller *self-regulating, wear-compensating* piston and rod seals *will not "freeze"* to prevent piston movement or to cause jumpy jerky action. These seals never need adjustment, have no provision for adjustment, therefore *cannot be over-adjusted.* The Miller rod seal operates against the Miller scratch-resistant, rustproof hard chrome plated piston rod; the Miller piston seal operates against the precision-honed highly polished finish of the Miller rustproof hard brass cylinder barrel. No wonder these seals still give leakproof, efficient service after millions of strokes. No wonder Miller Air Cylinders are completely free from the rust conditions common to ordinary cylinders.

In addition, *dirt wipers* at rod ends keep out all dirt and lint, and *solid steel* heads, caps, and mountings eliminate costly, dangerous breakage.

Write for illustrated cylinder bulletins A-105 and H-104

COMPLETE MILLER CYLINDER LINE INCLUDES: AIR CYLINDERS, 1½" to 20" BORES, 200 PSI OPERATION; LOW PRESSURE HYDRAULIC CYLINDERS, 1½" TO 6" BORES FOR 500 PSI OPERATION, 8" TO 14" BORES FOR 250 PSI; HIGH PRESSURE HYDRAULIC CYLINDERS, 1½" TO 12" BORES, 2000-3000 PSI OPERATION. ALL MOUNTING STYLES AVAILABLE.

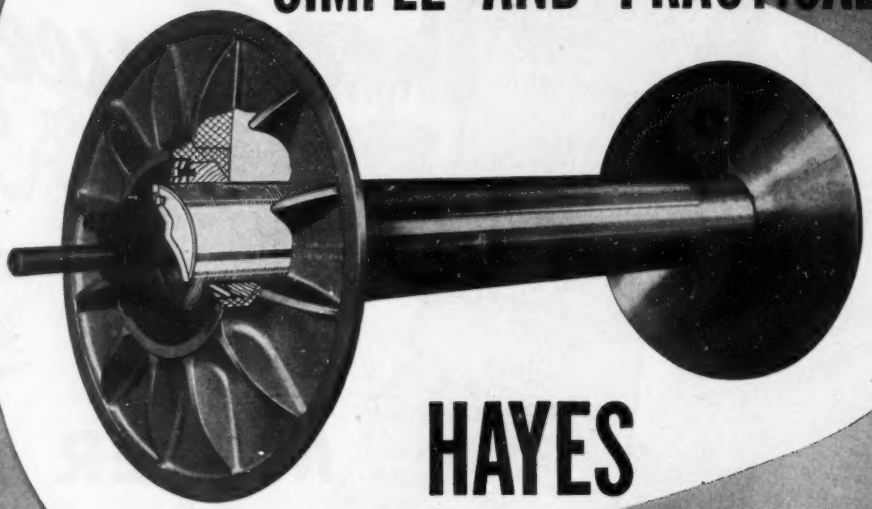
MILLER MOTOR COMPANY

4029-31 N. Kedzie Avenue — Chicago 18, Illinois

CLEVELAND — PITTSBURGH — PHILADELPHIA — DETROIT — YOUNGSTOWN — BOSTON — HARTFORD — NEW YORK CITY — DAYTON — ST. PAUL — FORT WAYNE — INDIANAPOLIS — MILWAUKEE — NASHVILLE — SEATTLE — LOS ANGELES — SAN FRANCISCO — BALTIMORE — ST. LOUIS and OTHER AREAS.

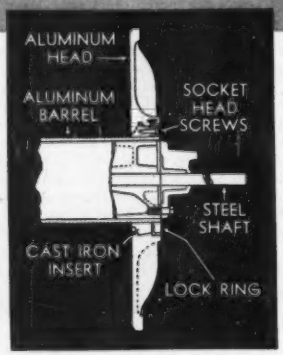
Sales and Service from coast to coast

new! SIMPLE AND PRACTICAL!



HAYES

ADJUSTABLE LOOM BEAMS



Sectional drawing of New Locking Device — simple — strong — stays put.

NOW, for the first time you can have the most practical, Adjustable Loom Beam yet devised. It is simple, easy to adjust and locks in any position. To secure the head in place, you simply tighten the socket head screws evenly on the locking mechanism. No special tools are required. The new and very simple built-in locking device shown at the left gives you greater head strength, *with no reduction in yarn space.* Here is a New, Adjustable Loom Beam that is strong and sturdy in construction, is accurately made and stays true indefinitely, and of course does not rust. *Yet it is so light in weight that two men can lift it into the slasher with ease!*

NOW, you can have the benefit of years of research, now you can have all the advantages of the conventional adjustable loom beam plus light weight, strength and accuracy never before achieved. Hayes produces Adjustable Loom Beams for all standard looms. Write for Catalog 100, on Hayes Beams. Due to present material curtailments, we may not be able to ship your Beams as quickly as you or we would like. We will however, do our best to fulfill your requirements.

HAYES

INDUSTRIES, INC.,

HOME OFFICE: Jackson, Michigan

EASTERN REPRESENTATIVE
J. Paul Laird
Philadelphia, Penn.

SOUTHERN REPRESENTATIVE
R. E. L. Holt Jr. & Assoc.
Greensboro, N. C.

THE WORLD'S LARGEST PRODUCER OF LIGHT METAL BEAMS

When Fabrics are Supple Selling is Smooth

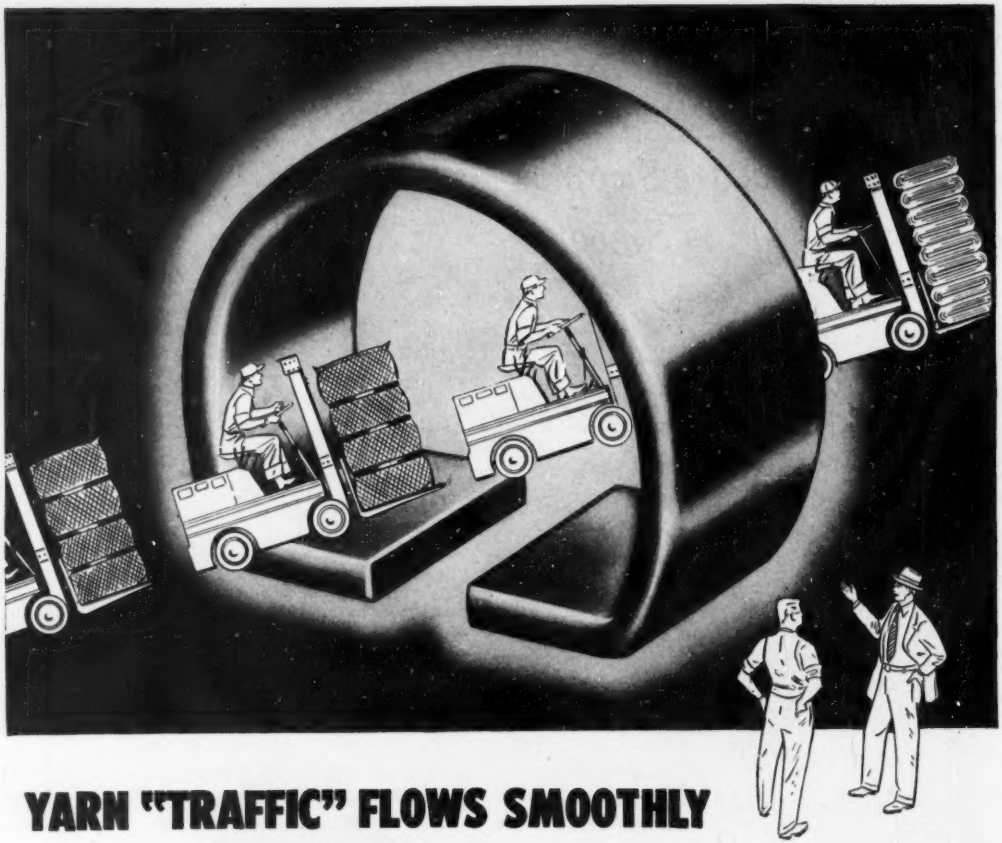
There's smooth selling ahead for supple fabrics, soft fabrics, fabrics with good dye affinity, good hand and other sales-winning qualities. Cyanamid Textile Chemicals are renowned in the industry for imparting such qualities to fabrics—qualities that facilitate processing and smooth the way to sales.

It will pay you to investigate their cost- and time-saving advantages. Ask our staff for a demonstration *today*.

AMERICAN Cyanamid COMPANY
INDUSTRIAL CHEMICALS DIVISION
30 ROCKEFELLER PLAZA, NEW YORK 20, N. Y.
In Canada: North American Cyanamid Limited, Toronto and Montreal

Cyanamid Textile Chemicals

DECERESOL® Wetting Agents
NO-ODOROL® Finishing Oils
Penetrants · Sizing Compounds



YARN "TRAFFIC" FLOWS SMOOTHLY

. . . *through Victors*

SINCE MOST MILLS' entire output passes through travelers — whether yarn traffic is speeded or stalled depends on your selection.

Which are your travelers — bottlenecks or broad highways? Assuming equipment is in proper condition, if the traveler is **wrong**, the flow of work through the mill will be slowed up at the spinning or twisting, production will lag, quality will suffer, and profits will sag. If the traveler is **right**, you can meet output schedules, cut down waste, and upgrade quality.

With the many new developments in synthetics and blends, it is becoming more and more difficult to be sure the traveler you use is **right** for the job. To save valuable time in setting up the smooth-running spinning and twisting you want, you need up-to-the-minute information.

There's a man near you who knows what you want to know about choosing travelers. He's the Victor Service Engineer and his job is to keep abreast of every new development. He will help you select the **right** traveler for any fiber, any blend you may be running. Write, wire, or phone the nearest Victor office for prompt service.

Keep a Step ahead with

VICTOR Ring Travelers

VICTOR RING TRAVELER COMPANY

PROVIDENCE, R. I. . . . . 20 Mathewson St. . . . . Tel. DExter 1-0737

GASTONIA, N. C. . . . 358-364 West Main Ave. . . . . Tel. 5-0891

Manufacturing says:
"I'VE BEEN HEARING A LOT ABOUT THE NEW WHITIN METHOD OF PROCESSING WORSTED, WORSTED BLENDS AND SYNTHETICS!"

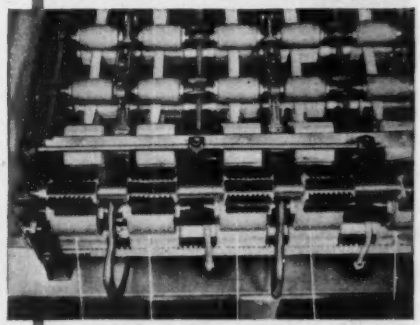
Management says:
"THEY SAY IT REDUCES MACHINE INVESTMENT... NOT SO MANY MACHINES NEEDED... SAVES SPACE, TOO. BETTER LOOK INTO IT TODAY!"

Of course, they're both talking about the AMERICAN SYSTEM

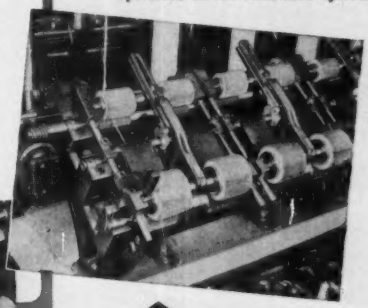
From both manufacturing and management viewpoints, the Whitin-developed American System for processing worsted, worsted blends and synthetics has much to recommend it. It is a very flexible, economical and efficient system for producing quality yarns . . . a system that permits a sharp reduction in the number of processes required—sometimes as much as 50 per cent—with a consequent reduction in the number of machines required. It is designed to process fibers from 1½ inch staple up to 4½ inch staple and worsted counts up to and including 40's.

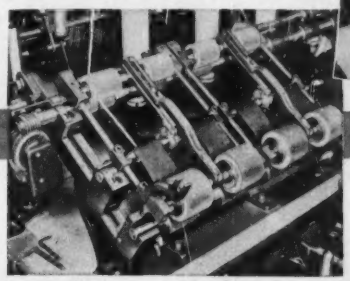
The American System can be readily supplied on new equipment. It can also be applied to both roving and spinning frames as a changeover on most American-made machines.

Whether as new equipment or as changeovers, the American System permits material reduction in machine investment, saves floor space, and cuts operating costs.



Close-up of Super-Draft Roving frame showing bottom rolls, top rolls, back bars, aprons, cradles, etc., as assembled for operation on the American System.





1

2

Close-up of Spinning frame bottom rolls, top rolls, back bars, aprons, cradles, etc., showing rolls set to

1. *Close setting for shorter staple lengths*
2. *Open setting for longer staple lengths*

Write today for illustrated folder giving complete information about the American System.

Whitin MACHINE WORKS

WHITINSVILLE, MASSACHUSETTS

CHARLOTTE, N. C. • ATLANTA, GA. • SPARTANBURG, S. C. • DEXTER, ME.

NO Lint

Troubles Here

QUICK-CLEAN wide open design sweeps lint and dirt in . . . out . . . and away. None can stay in the motor to cause costly trouble.

YOU JUST DON'T HAVE MOTOR TROUBLES due to lint and dirt laden atmospheres when you use *Quick-Clean* motors. Powerful fans sweep cooling air in and out again through large air passages. Interior surfaces are smooth, hard and contoured to aid air flow. There is no place where lint and dirt can collect.

Cast Iron Frame

The frame of the *Quick-Clean* motor is rigid cast iron which inherently resists the corrosive action of moist mill atmospheres. Cast iron insures never-changing alignment under all normal operating conditions.

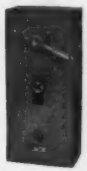
Factory Lubricated Bearings

Bearings are lubricated at the factory and operate without attention or cost for years. Grease or oil cannot leak from the bearings to soil materials or collect dirt. Lint and dirt cannot enter the bearing.

Get the Facts

Your nearest Allis-Chalmers Authorized Dealer or Sales Office has complete information on the *Quick-Clean* motor. Or write Allis-Chalmers, Milwaukee 1, Wisconsin for the bulletins shown below.

Match Quick-Clean Motors with A-C Starters



Developed for dependable, safe starting of *Quick-Clean* motors. Other controls for all electrical equipment in your plant. For competent application engineering, see your Allis-Chalmers Authorized Dealer or Sales Office.

A-3232

Quick-Clean, Texrope and *Vari-Pitch* are Allis-Chalmers trademarks.

Send for Free Engineering Literature

Quick-Clean Motors	51B6055	Power Generating Equipment, Transformers, Circuit Breakers, Power Distribution Equipment	25B6150
Allis-Chalmers Loom Motors	51B7111		
Texrope Drives	20B6051		
Vari-Pitch Automatic Sheave	20B7223	Dielectric Heater	15B6431

COMPLETE SERVICE from power line to machine

Transformers · Motor Control · Motors · Texrope Drives

ALLIS-CHALMERS

Originator of the Multiple V-Belt Drive for the Textile Industry

45

Years

★

AS ELECTRICAL CONTRACTORS
TO THE TEXTILE INDUSTRY

★

J. M. CLAYTON COMPANY

Contracting Electrical Engineers

ATLANTA, GEORGIA

use BECCO HYDROGEN PEROXIDE and BECCO PROCESSES for WOOL BLEACHING

Blanket wool, women's coat and dress goods, knitting yarns—indeed, wool in any form—becomes a bright, permanent white in color or is ready for dyeing in pure and delicate pastels when bleached with BECCO Hydrogen Peroxide.

For carpet wool in stock or yarn, hydrogen peroxide reduces the shade variations of natural wool so that dyeing gives the superb quality of uniform, true, and brilliant colors to the finished product.

BECCO Processes are simple, and precisely controlled . . . kind to the fibers . . . the result of years of laboratory study and proved operation in the hands of successful manufacturers who bleach raw stock, top, yarn, and fabric.

BECCO representatives can help you as they have helped others in the profitable application of BECCO Hydrogen Peroxide and BECCO Processes to your bleaching problems. BECCO SALES CORPORATION, Sales Agent for BUFFALO ELECTRO-CHEMICAL COMPANY, INC., BUFFALO 7, N. Y. • BUFFALO • BOSTON CHARLOTTE • CHICAGO • NEW YORK • PHILADELPHIA

BECCO SALES CORPORATION
Buffalo 7, New York

We are interested in further information on the bleaching of . . .

☐ Wool stock ☐ Wool top ☐ Wool yarn ☐ Wool fabric

☐ Other Wool products_____

Name_____ Title_____

Company_____

Street_____

City_____ Zone_____ State_____ TI-2-51

Complete Blending, Opening, Cleaning and Picking Systems for Cotton Mills

Opening, Blending and Picking Systems for Synthetic Fibers

New, and Rebuilt, Single-Process Pickers

The Aldrich Synchronized Single Process Picking System has consistently produced more uniform card sliver than any other picking system.

Parts for Kitson Pickers Always in Stock for Immediate Delivery

AldricH MachinE
Greenwood WorkS South Carolina

EXTRA HIGH LIGHT INTENSITY

in SLOW-SPEED Stroboscopic Applications

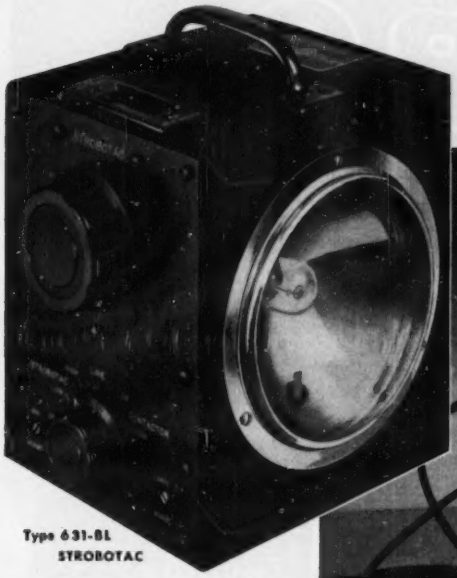
THE STROBOLUME is designed to give an extra-brilliant, short-intensity stroboscopic light for observation of very slow-moving objects or machine operations . . . much slower than can be observed with our other Stroboscopes.

The Strobolume is particularly suited to single- or multiple-flash stroboscopic photography, having a flash duration of approximately *ten millionths* of a second . . . about *one-twentieth* of that of the average commercial "speed lamp".

The Strobolume can be operated in several ways. It is equipped with a push-button and cord for firing at finger-controlled intervals. With an external contractor its flashing may be timed to correspond to the speed of a rotating shaft. When so used it will flash up to 1200 times per minute.

A special slow-speed STROBOTAC® is available for operation with the Strobolume at flashes from 60 to 1200 per minute. The special Strobotac alone has a speed range of 60 to 14,400 per minute.

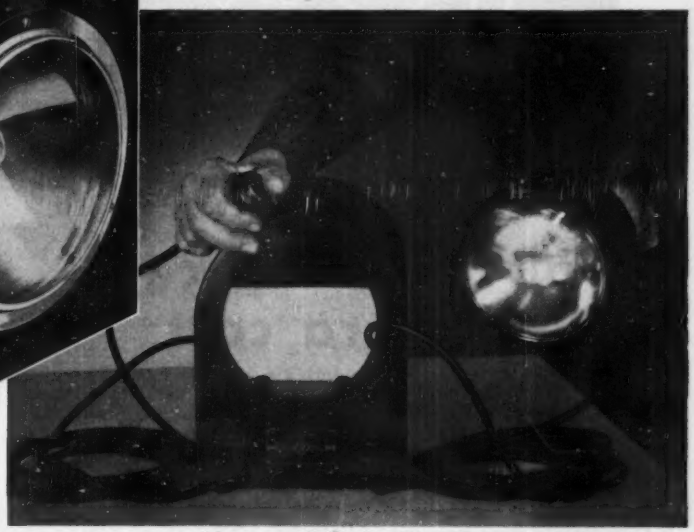
At flashing rates up to 45 per minute the Strobolume may be operated continuously. At other speeds, up to its maximum of 1200, it can be operated for short periods before a built-in automatic circuit breaker calls for a brief rest period.



Type 631-BL
STROBOTAC

STROBOTAC has a flashing rate of 60 to 14,400 flashes per minute. It is the auxiliary control instrument to use when the STROBOLUME is to be flashed continuously. It is lightweight, portable and completely self-contained and has a dial which is calibrated in rpm.

TYPE 631-BL STROBOTAC . . . $170.00

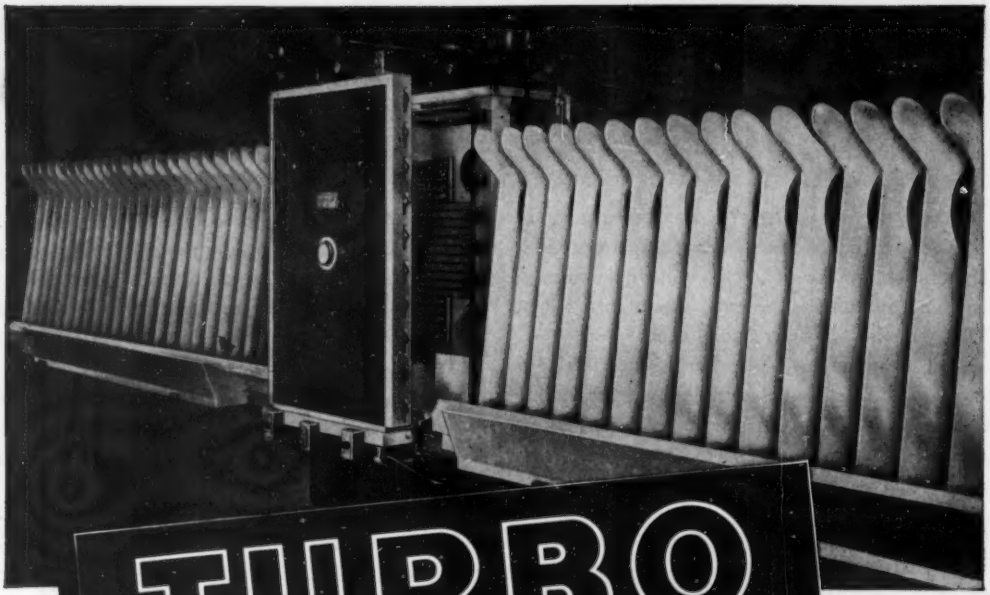


Many new fields for the stroboscopic study of slow moving machines are opened to research, design and production with the Strobolume. **Price: $245.00**

Write for your copy of "THE STROBOLUME BULLETIN"

GENERAL RADIO COMPANY Cambridge 39, Massachusetts

90 West St., New York 6 920 S. Michigan Ave., Chicago 5 1000 N. Seward St., Los Angeles 38



TURBO AD-48

Gives you Dual Performance at no extra cost

Study the operation of the new Turbo AD-48. See how it keeps temperatures steady during finish boarding to give you static-free stockings perfectly finished. See the accurate timing device which automatically governs the precise preboarding operation. Here is a precision machine which gives you dual performance at no extra cost—you finish board with heated air, preboard in a sealed chamber, or you can do both if this fits your production requirements.

With the Turbo AD-48, every movement is automatic, fast, quiet . . . no banging or jarring. It is gentle as a lamb with your finest nylons. Stockings move in and out of the steaming chamber with clock-like regularity.

There are two groups of 24 forms each in the Turbo AD-48. You can run two sizes at one time. No production delays. Operator strips or dresses one group of forms while the other is in the chamber. Production rating is 120 to 130 dozen pairs per 8-hour day.

Find out how the Turbo AD-48 can bring new economies to your mill—high production of "firsts", lower costs and improved efficiency. Get all the facts today on the Turbo AD-48.

Write for this folder

TURBO MACHINE COMPANY
LANSDALE, PENNSYLVANIA
Southern Representative: F. W. Warrington Co., Charlotte, North Carolina

1. Eliminates packing and roping of fabrics.

2. Tends to protect fabrics to be dyed from chafe marks, rope marks and other distortions to the weave.

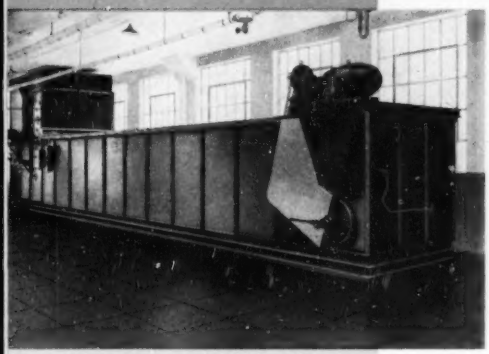
3. Conveyor principle lessens danger of tangling and pulling of fabrics.

4. Bleaching time reduced to less than one hour.

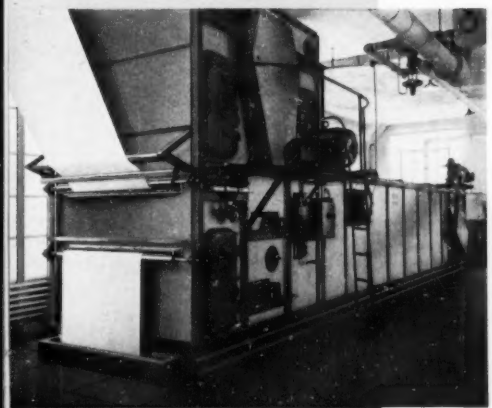
5. Considerable cost saving over less automatic operations.

Check these advantages

OF CONTINUOUS CONVEYOR BLEACHING IN THE PROCTOR-MATHIESON OPEN WIDTH STEAMER



Caustic steamer in typical installation



Peroxide steamer in the same installation

Continuous conveyor bleaching as done in the Proctor-Mathieson system is meeting a long standing need in the textile industry.

Open width bleaching is accomplished in a continuous process by gently conveying the fabric through the caustic and peroxide steaming cycles, thus combining the advantage of continuous bleaching with a minimum amount of cloth pressure through packing, roping of the fabric or distortion to the weave.

The Proctor-Mathieson system is particularly applicable for goods that are to be vat dyed, since the conveyor system lessens the dangers of chafe marks, rope marks and other distortions which could cause defects in dyeing.

Ten commercial installations of this equipment are producing results that prove the advantages of this system in handling a variety of fabrics that are later dyed all shades.

Investigate the possibilities of the Proctor-Mathieson continuous open width steamer in your plant.

PROCTOR & SCHWARTZ · INC

PHILADELPHIA 20 · PA ·

Designers and Manufacturers of

AUTOMATIC BLENDING and STOCK CONVEYING EQUIPMENT • CARDING and GARNETTING MACHINES • DRYERS FOR STOCK • YARN • PIECE GOODS • NYLON SETTING

In Reprocessing NYLON WASTE

PROCTOR EQUIPMENT

Results in THREAD FREE GARNETTS . . . EVENLY SPUN YARNS . . .

Proctor equipment for reprocessing nylon waste is resulting in fabrics being reduced to the fiber stage in such a way that waste is ideally suited to re-spinning. The reason is simply that the entire Proctor system has been designed to meet the specific needs of the nylon waste plant. The first all nylon waste plant ever built went into operation during the summer—completely Proctor equipped. Results reported by that plant indicate that this Proctor specially designed equipment results in thread free garnetts and makes possible evenly spun yarns.

The whole emphasis of this system is on the gradual reduction of fabric to the fiber stage and is accomplished in such a way that percentage of spinnable fibers recovered from the woven fabric is greater than has ever been possible with any other system of reduction.

Waste material is fed first to a Proctor picker, especially designed for nylon waste, which gives a preliminary opening action. From this picker, it is discharged through a condenser to a coarse shredder, then through a condenser to a fine shredder and through another condenser to three garnetts.

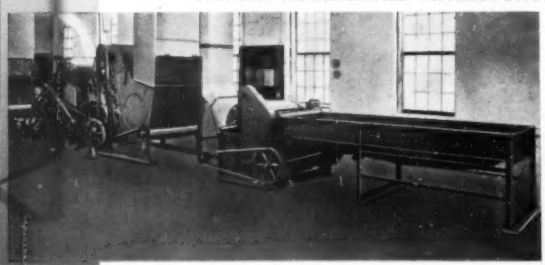
Of course, the system may be varied as to the number of units and their arrangement—but in any installation, the principle of gradual reduction to the fiber stage will be maintained.

For complete information about Proctor equipment for nylon waste reprocessing—or any waste reprocessing need, write today.

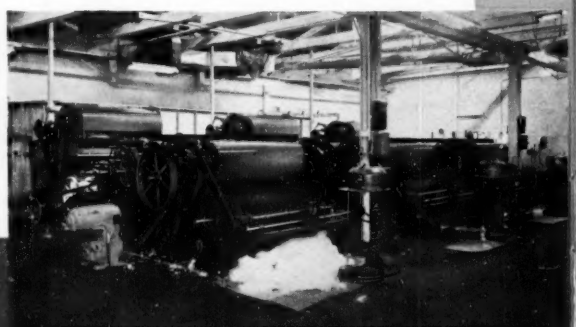
PROCTOR & SCHWARTZ · INC ·
PHILADELPHIA 20 · PA ·

Designers and Manufacturers of

AUTOMATIC BLENDING and STOCK CONVEYING EQUIPMENT · CARDING and GARNETTING MACHINES · DRYERS FOR STOCK · YARN · PIECE GOODS · NYLON SETTING

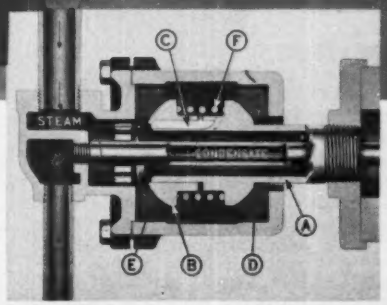


Preparatory line of equipment includes Proctor picker especially designed for handling nylon, followed by a condenser and coarse shredder, a second condenser and fine shredder.



Final work in reprocessing nylon is done by three garnetts designed to meet the special characteristics of nylon.

Johnson Joints installed on large dry cans at Indianapolis Bleachery Co., Indianapolis, Ind. Cross-section view below explains their cost-cutting, production-boosting operation.



Add up all the shortcomings of ordinary stuffing boxes — the endless repacking, oiling and adjusting; the efficiency-drop and rapid wear that comes with misalignment. It comes to quite a lot of trouble and expense.

All these troubles are gone in the installation pictured here. No wonder the line-up of Johnson Joints stretches clear through the textile industry. The men who make textile machines, like the mill men who operate them, agree almost unanimously that any dry can, sanforizer or slasher is better machinery with Johnson Joints.

Here is one step you can take which will definitely stretch production and personnel, yet pays its cost out of savings in maintenance alone.

Sizes and styles for every need: write for catalog.

Get *all* these savings — *only* in Johnson Joints

- **Completely Packless**—Rotating nipple (A) and collar (B) are keyed together (C), but fit loosely so pressure can fill housing, press seal ring (D) against nipple.
- **Self-Lubricating**—Seal ring (D) and bearing ring (E) are of long-lived carbon graphite, need no lubrication.
- **Self-Adjusting**—Spring (F) is for initial seating only. In operation, the higher the pressure the tighter the seal.
- **Self-Aligning**—Note room for lateral movement of rotating assembly, spherical seating for angular movement.

Products of The Johnson Corporation

815 Wood Street, Three Rivers, Michigan

Rotary Pressure Joints • Compressed Air Separators and Aftercoolers
Direct Operated Solenoid Valves • "Instant" Steam Water Heaters

How Junior Stays Dry and Comfortable

The manufacturer of this wool gabardine snow suit wanted a fabric that would stay dry in all kinds of weather . . . resist surface spots and stains . . . reduce the tearing and wearing that result from active hours outdoors. Amalgamated Chemists solved the problem with FEN Water Repellents.

Water Repellents are just one of our products. We offer a complete line of Fabric and Hosiery Finishes, Dyeing Assistants and Scouring Agents plus the services of Representatives who are trained technical men.

If you have a problem in your mill—if colors are dull, patterns are fuzzy, fabrics are lifeless—Amalgamated Field Representatives are ready to assist with any textile chemical problem. Our modern, fully equipped research and production laboratories—our time and experience—are at your service for better fabrics, bigger profits. Write or call Amalgamated.

AMALGAMATED CHEMICAL CORP., Phila. 34, Pa.
Southern Division: 1819 Spring Garden Street, Greensboro, N. C.

Amalgamated

MILLS REPORT 3-WAY SAVINGS WITH NEW SUNOTEX MACHINE OIL

Since its recent introduction, new Sunotex Machine Oil, *an all-purpose oil specifically developed for the textile industry*, has already proved its ability to lower costs three ways.

1. PREVENTS RUSTING. A loom manufacturer, determined to find the best lubricant for a new model, compared Sunotex Machine Oil with regular machine oils on looms in his experimental room. After two months, at humidity conditions ranging from 70% to 100%, all cams and bearings on the loom protected with Sunotex Machine Oil were absolutely rustfree. On those lubricated with ordinary machine oils, serious rusting had taken place.

2. SCOURS OUT COMPLETELY. Staining had always been a problem to a producer of worsted suitings. It had also been a source of trouble in a nylon knitting mill. Both found Sunotex Machine Oil to be the solution. Tests run in direct sunlight prove that Sunotex Machine Oil *scours out completely* from all types of fabrics—cotton, wool, rayon, and nylon.

3. KEEPS BOTH FABRIC AND MILL CLEAN Sunotex Machine Oil has a natural adhesiveness. It "stays put" on bearings, gears, cams, and slides. As a result, much less oil needs to be scoured out of fabric or cleaned from floors. One woolen mill reports that its consumption of oil has been cut two-thirds, due to the adhesiveness and stability of Sunotex Machine Oil.

IN ADDITION, THEY GET THESE BENEFITS

(a) **REDUCED INVENTORIES.** Sunotex Machine Oil simplifies lubrication. The single grade provides superior protection over a wide range of speeds and pressures. Sunotex Machine Oil is the correct lubricant for about 90% of all textile machinery. It practically eliminates the possibility of failure due to the accidental application of the wrong lubricant.

(b) **MINIMUM WEAR.** Sunotex Machine Oil helps to prolong machine life. It has extreme pressure properties which minimize friction wear even under the most severe operating conditions. It does not thin out appreciably as temperatures rise. Consequently a protective film of oil is always on bearings, gears, and cams.

SUN OIL COMPANY • ***Philadelphia 3, Pa.***

In Canada: Sun Oil Company, Ltd., Toronto and Montreal

Why not let Sunotex Machine Oil save you money? Ask the nearest Sun Office for a sample of Sunotex Machine Oil and a booklet giving further information. Or, if you prefer, write to Department TI-2.

SUN PETROLEUM PRODUCTS

"JOB PROVED" IN EVERY INDUSTRY

SUNOCO

We hold this to be the most important

Let us look back a few years and see what conditions prevailed in the cotton textile industry "Before 'Sanforized.'"

In those unhappy days, there was chaos, insofar as shrinkage was concerned. There were no standards . . . NO universally accepted methods of wash-testing. There was *no real shrinkage control.*

THEN . . . the illustrious "Sanforized" licensees came along to bring order out of chaos. They made available, and promoted "Sanforized"-labeled fabrics of *all* types for *all* fields . . . fabrics with uniform, tested, dependable shrinkage control.

Thanks to the good works of the firms mentioned here, there was more "Sanforized"-labeled

WORLD-WIDE LIST OF

ARGENTINA

S. A. I. C. FABRICA ARGENTINA DE ALPARGATAS....Buenos Aires

AUSTRALIA

AUSTRAL SILK & COTTON MILLS PTY. LIMITED.....Melbourne
BRADFORD COTTON MILLS LIMITED
"Bradmil House," Camperdown, Sydney, N.S.W.

AUSTRIA

CARL GANAHL & CO.....Feldkirch
F. M. HAEMMERLE.....Dornbirn

BELGIUM

ALSBERGE & VAN OOST.....Gand

BRAZIL

COMPANHIA AMERICA FABRIL.....Rio de Janeiro
COTONIFICIO RODOLFO CRESPI, S.A.....Sao Paulo
S. A. INDUSTRIAS REUNIDAS F. MATARAZZO.....Sao Paulo
SAO PAULO ALPARGATAS, S.A.....Sao Paulo

CANADA

CANADIAN COTTONS LIMITED.....Montreal, Que.
CANBRI MANUFACTURING COMPANY LIMITED.....Ajax, Ont.
DOMINION TEXTILE COMPANY, LTD.....Magog, Que.
MONTREAL COTTONS LIMITED.....Valleyfield, Que.
ROBINSON COTTON MILLS, LIMITED.....Toronto, Ont.
WABASSO COTTON COMPANY, LTD.....Three Rivers, Que.
WOODS MFG. CO., LTD.....Welland, Ont.

CHILE

FABRICAS TEXTILES CAUPOLICAN-CHIGUAYANTE, S.A.
Chiguayante Mill, Concepcion
JORGE HIRMAS H.....Santiago

COLOMBIA

TEJIDOS EL CONDOR, S.A.....Medellin
COMPANIA COLOMBIANA DE TEJIDOS.....Medellin
FABRICA DE HILADOS Y TEJIDOS DEL HATO.....Medellin
TEJIDOS DE OCCIDENTE, S.A.....Manizales

CUBA

COMPANIA TEXTILERA ARIGUANABO, S.A.....Havana

CZECHOSLOVAKIA

JISKRA, BAVLNARSKE ZAVODY.....Cerveny Kostelec
KOLORA, BAREVNY A UPRAVNY.....Liberec
BAVLNARSKE ZAVODY V. I. LENINA.....Ruzomberok
PERLA, BAVLNARSKE ZAVODY.....Ceska Trebova

DENMARK

BLOCH & ANDRESEN.....Copenhagen
AKTIESELSKABET DE FORENEDE TEXTILFABRIKKER I.
AALBORG.....Aalborg
A/S GRENAA DAMPVAEVERI.....Grenaa

EIRE

SETFAST LIMITED.....Dublin

FRANCE

BLANCHIMENT, TEINTURE, IMPRESSION BOISSIERE FILS..Rouen
BLANCHISSERIE ET TEINTURERIE DE CAMBRAI.....Cambrai
ETABLISSEMENTS GAILLIARD & CIE.....Barentin
GILLET-THAON USINES: THAON-LES-VOSGES ET KINGERSHEIM
Paris
GUERRY-DUPERAY & FILS.....Roanne
MANUFACTURERS HARTMANN & FILS.....Munster (Ht.-Rhin)
ETABLISSEMENTS SCHAEFFER & CIE.....Pfastatt-le-Chateau
SOCIETE ANONYME DE BLANCHIMENTS TEINTURES ET
IMPRESSIONS.....Lyon

GERMANY

GEBR. BOEGGERING, G.M.B.H.....Bocholt
DRUCKEREI & APPRETUR BROMBACH A. G.....Brombach
M. VAN DELDEN & CO.....Gronau
CHRISTIAN DIERIG A. G.....Augsburg
BAUMWOLL INDUSTRIE ERLANGEN-BAMBURG A. G.....Erlangen
AUGUST GEIGER KOMM. GES.....Kirchheim-Teck
ULRICH GMINDER, G.M.B.H.....Reutlingen
NIEHUES & DUETTING.....Nordhorn
HEINRICH OTTO & SOEHNE.....Wendlingen
SPINNEREI UND WEBEREI PFERSEE, A. G.....Augsburg
LUDWIG POVEL & CO.....Nordhorn
TEXTILAUSRUESTUNG & DRUCKEREI PRINZ A. G.....Augsburg
BLEICHEREI, FAERBEREI & APPRETUR-ANSTALT UHINGEN, A.G.
Uhingen
HERMANN WINDEL, G.M.B.H.....Windelsbleiche

GREAT BRITAIN

BLEACHERS' ASSOCIATION LIMITED
Blackfriars House, Parsonage, Manchester 3

In Seven Plants as Follows

T. R. Bridson & Sons Ltd.....Bolton Bleachworks, Bolton
Eden & Thwaites, Ltd.....Edgeley Bleachworks, Stockport, Cheshire
James Hardcastle & Co., Ltd.....Bradshaw Works, nr. Bolton
Kirkpatrick Bros. Ltd.....Ballyclare, County Antrim, Northern Ireland
James McHaffie & Son Ltd..Kirktonfield, Neilston (Near Glasgow), Scotland
Sykes & Company Ltd.....Edgeley Bleachworks, Stockport, Cheshire
John Stanning & Son Ltd.....Leyland Bleachworks, Leyland, Preston

BRADFORD DYERS' ASSOCIATION, LTD.....39 Well Street, Bradford
J. CHADWICK & CO., LTD.....Springbrook Works, Oldham, Lanc.
CLIFTON MILLS, LIMITED.....Poolstock Mills, Wigan, Lanc.
DEAKINS, LIMITED.....Egerton Dye Works, nr. Bolton
DROMONA & MAINE LIMITED..
Culleybackey, County Antrim, Northern Ireland
P. W. GREENHALGH & CO., LTD.
Ogden Mill, New Hey (nr. Rochdale) Lanc.
GROVE DYEING CO., LTD.....Littleborough, Lanc.
J. J. HADFIELD, LTD.....Garrison Bleach & Dye Works, Birch Vale
J. MANDLEBERG & CO., LTD..Albion Works, Pendleton, Salford 6, Lanc.
THE PIN CROFT DYEING AND PRINTING CO.
Market Street, Adlington, Lanc.
RAINSHORE BLEACHING & DYEING CO. LTD.
Norden, Rochdale, Lanc.
TURNBULL & STOCKDALE LTD.
Chancery Chambers, 55 Brown St., Manchester 2, Lanc.
JOHN WALTON OF GLOSSOP, LTD.
Charlestown Bleach Works, Glossop, Derbyshire
DAVID WHITEHEAD & SONS LTD.....Lower Mill, Rawtenstall
YORKSHIRE DYEING AND PROOFING COMPANY, LTD.
Spring Vale Works, Middleton, Near Manchester
YORK STREET FLAX SPINNING CO., LTD...Belfast, Northern Ireland

HOLLAND

BLIJDENSTEIN & CO., N. V.....Enschede
BOEKELOSCHE STOOMBLEEKERIJ N. V.....Boekelo
VAN HEEK & CO., N. V.....Enschede
KONINKLIJKE STOOMWEVERIJ TE NIJVERDAL N. V.....Almelo
N. V. NEDERLANDSCHE STOOMBLEEKERIJ.....Nijverdal
J. F. SCHOLTEN & ZONEN N. V.....Enschede

INDIA

BINNY & CO. (MADRAS) LIMITED.....Madras

ISRAEL

KURDANEH TEXTILE WORKS, LTD..c/o "Ata" Textile Co., Ltd., Haifa

ITALY

COTONIFICIO CANTONI.....Legnano
TINTORIA COMENSE S.A.....Como
REGGIANI MANIFATTURA, S.A.....Bergamo
COTONIFICIO VALLE DI SUSA.....Torino

MEXICO

ACABADOS MEXICO, S.A.....Tlalpan, Mexico, D.F.
ACABADOS TEXTILES MARVEL, S.A.....Coyoacan, Mexico, D.F.
ATOYAC TEXTIL, S.A.....Puebla, Puebla
COMPANIA INDUSTRIAL MANUFACTURERA DE ATLIXCO
Atlixco, Puebla
COMPANIA INDUSTRIAL DE PARRAS, S.A.....Parras, Coahuila
CIA. INDUSTRIAL DE SAN ANTONIO ABAD, S.A.....Mexico, D.F.
COMPANIA INDUSTRIAL VERACRUZANA, S.A.
Ciudad Mendoza, Ver.
EL GLOBO, S.A.....Atzcapotzalco, Mexico, D.F.
EXPLOTADORA DE INDUSTRIAS Y TEXTILES, S.A....Mexico, D.F.
NACIONAL TEXTIL MANUFACTURERA, S.A.....Guadalajara, Jalisco
TEXTILES MONTERREY, S.A.....Monterrey, Nuevo Leon

NORWAY

TEKSTILFOREDLING A/S-TEFAS.....Oslo

PERU

COMPANIAS UNIDAS VITARTE, VICTORIA, INCA, S.A.....Lima
FABRICA DE TEJIDOS "LA UNION" LTDA.....Lima

directory in the whole textile world!

yardage turned out in the year of 1950 than in 1949—or even in 1948!

To our licensees good and true, we bow from the waist... in mutual friendship... and toward an even more productive 1951!

"SANFORIZED" LICENSEES

SWEDEN

ALINGSAS BOMULLSVAFVERI AKTIEBOLAG.....Alingsas
BORAS WAEFVERI AKTIEBOLAG.....Boras
GAMLESTADENS FABRIKERS AKTIEBOLAG.....Goeteborg
GEFLE MANUFAKTUR AKTIEBOLAG.....Stroemsbro
MANUFAKTUR AKTIE BOLAGET I MALMOE.....Malmoe
MOELNLYCKE VAEFVERIAKTIEBOLAG.....Goeteborg

SWITZERLAND

A. G. FEHLMANN SOEHNE.....Schoftland
GUGELMANN & CO., LTD.....Langenthal
HABIS-TEXTIL A. G.....Flawil
HEBERLEIN & CO., A. G.....Wattwil
AKTIENGESELLSCHAFT A. & R. MOOS.....Weisslingen
R. MUELLER & CIE. A. G.....Seon
RADUNER & CO., A. G.....Horn
STOFFEL & CO.....St. Gallen
AKTIENGESELLSCHAFT CARL WEBER.....Winterthur

SYRIA

ARIDA BROTHERS CORPORATION.....Tripoli, Lebanon

URUGUAY

S. A. FABRICA URUGUAY DE ALPARGATAS.....Montevideo

VENEZUELA

C. A. TELARES DE MARACAY.....Maracay (Aragua)

UNITED STATES

ALABAMA MILLS, INC.....Wetumpka, Ala.
AMERICAN FINISHING COMPANY.....Memphis, Tenn.
APONAUG MANUFACTURING CO.....Kosciusko, Miss.
APPLETON COMPANY, (Division of J. P. Stevens & Co., Inc.) Anderson, S. C.
THE APPONAUG COMPANY–(The Aspinook Corp.)...Apponaug, R. I.
ARMS TEXTILE MANUFACTURING CO.....Manchester, N. H.
ARNOLD PRINT WORKS DIV. (The Aspinook Corp.)....Adams, Mass.
THE ASPINOOK CORPORATION.....Jewett City, Conn.
AVONDALE MILLS.....Alexander City, Ala.
AVONDALE MILLS.....Pell City, Ala.
AVONDALE MILLS.....Sylacauga, Ala.
JOS. BANCROFT & SONS CO.....Wilmington, Del.
BELLMAN BROOK BLEACHERY CO.....Fairview, N. J.
BRADFORD DYEING ASSOCIATION (USA).....Westerly, R. I.
BROWN MANUFACTURING CO.....Concord, N. C.
BURLINGTON MILLS CORPORATION, Cramerton Mills Division Cramerton, N. C.
CANTON COTTON MILLS.....Canton, Ga.
CHICOPEE MANUFACTURING CORPORATION.Chicopee Falls, Mass.
CLEARWATER FINISHING CO.....Clearwater, S. C.
COLD SPRING BLEACHERY, INC.....Yardley, Pa.
CONE MILLS CORPORATION–Cone Finishing Co. Plant Greensboro, N. C.
CONE MILLS CORPORATION–Haynes Plant.....Cliffside, N. C.
CONE MILLS CORPORATION–White Oak Mill.....Greensboro, N. C.
CONE MILLS CORPORATION–Proximity Mill.....Greensboro, N. C.
CONE MILLS CORPORATION–Revolution Division...Greensboro, N. C.
CONE MILLS CORPORATION–Salisbury Plant.....Salisbury, N. C.
CONE MILLS CORPORATION–Minneola Plant.....Gibsonville, N. C.
CONSOLIDATED TEXTILE CO.–Windsor Print Division North Adams, Mass.
CRANSTON PRINT WORKS COMPANY.....Cranston, R. I.
CRANSTON PRINT WORKS COMPANY.....Webster, Mass.
CRANSTON PRINT WORKS COMPANY.....Fletcher, N. C.
CROMPTON-SHEN-ANDOAH CO.....Waynesboro, Va.
CRYSTAL SPRINGS BLEACHERY.....Chickamauga, Ga.
DAN RIVER MILLS, INCORPORATED.....Danville, Va.
DEMPSEY BLEACHERY & DYE WORKS CORP.....Pawtucket, R. I.
ERWIN MILLS INCORPORATED.....Cooleemee, N. C.
ERWIN MILLS INCORPORATED.....Erwin, N. C.
ERWIN MILLS INCORPORATED.....Stonewall, Miss.
EXETER MANUFACTURING COMPANY.....Exeter, N. H.
FAIRFOREST COMPANY–Eagle & Phenix Division.....Columbus, Ga.
FAIRFOREST FINISHING CO.....Spartanburg, S. C.
FRUIT OF THE LOOM, INC.....Pontiac, R. I.
GLENCOE MILLS.....Burlington, N. C.
GLENLYON PRINT WORKS.....Phillipsdale, R. I.
GOLD-TEX FABRICS CORP.–Mill Division.....Rock Hill, S. C.
GOODALL-SANFORD, INC.....Sanford, Maine
GREAT FALLS BLEACHERY & DYE WORKS, INC..Somersworth, N. H.
GRANITEVILLE COMPANY–Gregg Division.....Graniteville, S. C.
GRANITEVILLE COMPANY–Sibley-Enterprise Division....Augusta, Ga.
HAMPTON PRINT WORKS DIV.–(The Aspinook Corp.) Easthampton, Mass.
HARTSVILLE PRINT & DYE WORKS.....Hartsvile, S. C.
HIGHLAND PARK MANUFACTURING CO.....Charlotte, N. C.
INDUSTRIAL COTTON MILLS CO., INC.....Rock Hill, S. C.
A. D. JUILLIARD & CO., INC.–Oneida Bleachery Div. New York Mills, N. Y.
KERR BLEACHING & FINISHING WORKS, INC.....Concord, N. C.
LANETT BLEACHERY & DYE WORKS.....West Point, Ga.
LANE COTTON MILLS COMPANY.....New Orleans, La.
LONSDALE COMPANY–(Lincoln Bleachery).....Lonsdale, R. I.
LOWELL BLEACHERY, INC.....St. Louis, Mo.
LOWELL BLEACHERY SOUTH.....Griffin, Ga.
ANDREW Y. MICHIE & SONS CO.....Philadelphia, Pa.
THE MILLVILLE MANUFACTURING CO.....Millville, N. J.
MOORESVILLE MILLS.....Mooresville, N. C.
MOUNT HOPE FINISHING COMPANY.....North Dighton, Mass.
NATIONAL DYEING & FINISHING CORPORATION.Culver City, Calif.
NEW BRAUNFELS TEXTILE MILLS.....New Braunfels, Texas
NORTH CAROLINA FINISHING COMPANY.....Salisbury, N. C.
PACIFIC MILLS.....Lyman, S. C.
PACOLET MANUFACTURING CO.....New Holland, Ga.
PEE DEE TEXTILE COMPANY, INC.....Rockingham, N. C.
PEPPERELL MANUFACTURING COMPANY.....Lindale, Ga.
PEPPERELL MANUFACTURING COMPANY–Alabama Division Pepperell, Ala.
PILOT MILLS CO.....Raleigh, N. C.
PLYMOUTH FINISHING CO., INC.....Fall River, Mass.
PROVIDENCE D. B. & C. CO.....Providence, R. I.
PURITAN LOOMS, INCORPORATED.....Philadelphia, Pa.
RENFREW BLEACHERY–(Brandon Corp.).....Travelers Rest, S. C.
RIEGEL TEXTILE CORPORATION–Ware Shoals Division Ware Shoals, S. C.
RIEGEL TEXTILE CORPORATION–Trion Division.....Trion, Ga.
ROANOKE MILLS COMPANY–Mill No. 1.....Roanoke Rapids, N. C.
ROBERTSON BLEACHERY & DYE WORKS.....New Milford, Conn.
ROCK HILL PRINTING & FINISHING CO.....Rock Hill, S. C.
THE RUSSELL MFG. CO., INC.....Alexander City, Ala.
SAYLES-BILTMORE BLEACHERIES, INC.....Biltmore, N. C.
SAYLES FINISHING PLANTS, INC.....Saylesville, R. I.
PHILIP L. SHEERR & SONS.....Frankford, Philadelphia, Pa.
SLATERSVILLE FINISHING CO. Division of Kendall Mills, Slatersville, R. I.
SOUTHBRIDGE FINISHING COMPANY.....Southbridge, Mass.
SOUTHERN BLEACHERY & PRINT WORKS, INC.....Taylors, S. C.
SPRINGS COTTON MILLS (Grace Bleachery).....Lancaster, S. C.
STANDARD BLEACHERY & PRINTING CO., INC...Carlton Hill, N. J.
J. P. STEVENS & CO., INC.–Delta Company Division Frankford, Phila., Pa.
J. P. STEVENS & CO., INC.–Delta Company Division.....Cheraw, S. C.
J. L. STIFEL & SONS, INC.....Wheeling, W. Va.
SUMMERDALE DYEING & FINISHING WORKS.....Holmesburg, Pa.
SWIFT MANUFACTURING COMPANY.....Columbus, Ga.
TEXAS TEXTILE MILLS.....McKinney, Texas
TEXAS TEXTILE MILLS.....Waco, Texas
TEXTRON, INC.–Nashua Division.....Nashua, N. H.
TEXTRON-SOUTHERN, INC.–Finishing Div.....Anderson, S. C.
THOMASTON MILLS–Bleachery Div.....Thomaston, Ga.
UNION BLEACHERY DIV. (The Aspinook Corp.).....Greenville, S. C.
THE UNITED STATES FINISHING COMPANY.....Norwich, Conn.
THE UTICA WILLOWVALE BLEACHING CO.....Chadwicks, N. Y.
WERTHAN BAG CORPORATION.....Nashville, Tenn.
WHITE BROTHERS, INC.....Winchendon Springs, Mass.
YATES BLEACHERY CO.....Flintstone, Ga.

•SANFORIZED•
TRADE ® MARK

Cluett, Peabody & Co., Inc. permits use of its trade-mark "Sanforized," adopted in 1930, only on fabrics which meet this company's rigid shrinkage requirements. Fabrics bearing the trade-mark "Sanforized" will not shrink more than 1% by the Government's standard test.

10 East 40th St., New York 16, N. Y. • MUrray Hill 5-5270

piping maintenance costs more now!

You do less of it

by using Dependable Quality

CRANE VALVES

That's why more Crane Valves are used than any other make

. . . no bonnet trouble with this valve

A typical example of low-maintenance Crane Quality—No. 465½ 125-Pound Iron Body Gates. Rarely does the bonnet joint need attention. Flange construction includes reinforcement to prevent distortion and utilizes more bolts, more closely spaced than is usual in valves of this class. Crane precision-guided seating reduces seat and disc wear. Packing has long life because these valves have a deep stuffing box filled with high grade asbestos ring packing. A ball-type gland equalizes the packing load.

Better performance features like these make Crane the better buy in valves of every type. Ask your Crane Representative for a demonstration.

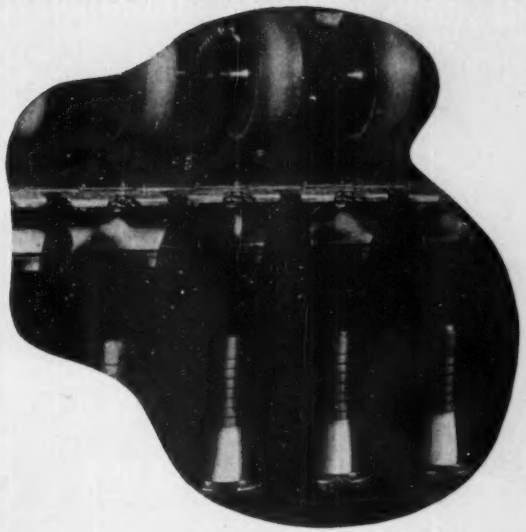
CRANE

CRANE CO., *General Offices:*
836 S. Michigan Ave., Chicago 5, Ill.
Branches and Wholesalers Serving All Industrial Areas

VALVES • FITTINGS • PIPE • PLUMBING • HEATING

Now use SYTON with blends

Syton Produces Greater Yarn Strength In Wool Blends



You've already found Syton, Monsanto's silica dispersion, a profit-booster in woolen and worsted spinning...

Now... mill trials prove Syton just as advantageous with blends. Smooth rayon staple behaves more like serrated wool fiber when Syton is applied to control inter-fiber slippage. And the proof is in the spinning. Sytonized wool-rayon yarn is 10%-30% stronger; and ends down are fewer—and with Syton you can spin finer counts on all blends, or use *less* twist and get equal yarn strength.

These, and other real advantages, mean *many* production savings all along the line—more profit despite rising costs. You'll want to put Syton to work for you... in your plant. So send the handy coupon below for full information.

For full information on Syton*, Sterox 6*, and other Monsanto textile chemicals such as Stymer*, for rayon slashing; Merlon* resins for durable finishes; Resloom*, for washability and wrinkle resistance; Sted*, for cleansing and scouring action; Catalyst AC for curing melamine and urea resin finishes; Dye fixatives; Rezgard*, fugitive-type flame retardant—check and return the coupon. *Reg. U.S. Pat. Off.

MILL A—55-45 wool-rayon blend. Applied 1.5% Syton to wool stock; then blended before carding. Front roll speed increased from 105 to 139 r.p.m.—resulting in over 30% increase in production.

MILL B—50-50 wool-rayon blend. Applied 2% Syton, 3% oil emulsion. Stock carded well and was spun to 3⅛ run yarn. Tensile strength increased from 75 to 89 lbs.—a gain of 18%.

MILL C—80-20 wool-nylon blend. Applied 2% Syton, 4% oil to wool stock; then blended with nylon. Overseer attributed improved spinning to uniformity of sliver and yarn.

MILL D—50-50 wool-Dynel blend. Applied 1% Syton, 2½% oil (based on weight of wool) to blended stock. Spun to 6 run. Good control of fibers, smooth, uniform yarn noted.

MILL E—50-50 wool-viscose blend. Applied 1½% Syton, 3% oil to wool; then blended with rayon. Mill had used Syton for 18 months on blends, including virgin and darnetted wool, acetate, viscose, and nylon, with consistently good results.

MONSANTO
CHEMICALS—PLASTICS

SERVING INDUSTRY...WHICH SERVES MANKIND

MONSANTO CHEMICAL COMPANY, Textile Chemicals Dept.,
Desk TIT-51, Everett Station, Boston 49, Mass.

Please send me information on: ☐ Syton ☐ Sterox 6 ☐ Stymer ☐ Merlon ☐ Resloom ☐ Sted ☐ Catalyst AC ☐ Dye fixatives ☐ Rezgard

Name & Title _____

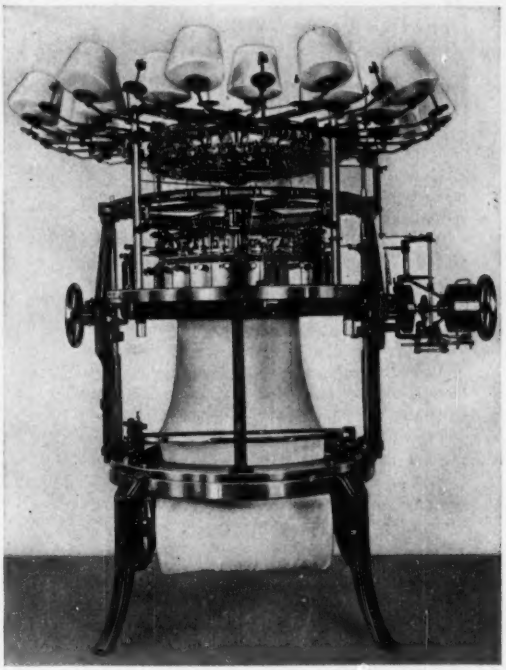
Company _____

Address _____

City, Zone, State _____

DEVELOPMENT OF KNITTING MACHINERY FOR MORE THAN 50 YEARS

PROGRESS
is measured by achievement



WILDMAN
INTERLOCK MACHINE

for

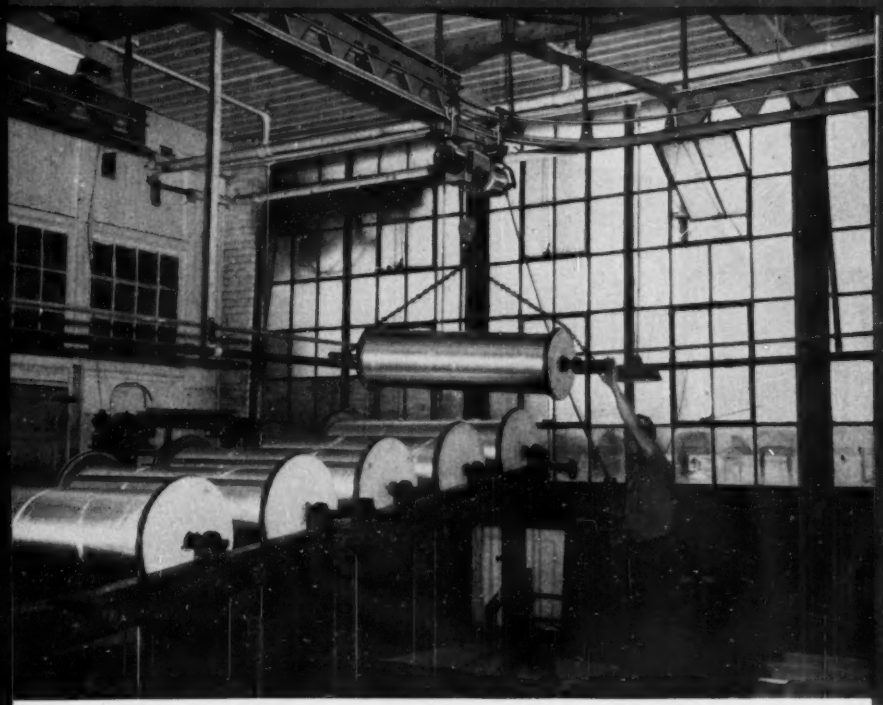
sportswear
underwear
dress fabrics
outerwear

In any field of endeavor, know-how blended with effort is the force that creates success. WILDMAN'S policy of keeping in step with the industry's needs is a plus factor in this aim. The Interlock Machine is a concrete example of maximum effort.

Designed in a range of sizes and cuts for sportswear, underwear, dress fabrics, outerwear—the INTERLOCK MACHINE represents maximum flexibility . . . Popular sizes 26" and 30". Also other sizes from 15" up. Furnished in all cuts up to 24 needles per inch.

WILDMAN MFG. CO. NORRISTOWN, PA.

Overhead handling with Louden MONORAIL saves labor, time . . .



Automatic Ceiling Cleaner

Just push the control button and let the Louden Automatic Ceiling Cleaner do the rest. As it travels around the room on its overhead Monorail track, the Louden Cleaner alternately sweeps right and left to keep ceiling, lights, piping, ducts free of lint. Write for details today.

MODERN TEXTILE MILLS USE

Louden

OVERHEAD MATERIAL HANDLING

Production has been stepped up and labor costs stepped down wherever Louden Overhead Material Handling Systems have been installed in the cotton and rayon textile industries. In the photograph above one man is lowering a beam into the creel of a slasher, and doing it effortlessly, safely and precisely.

This is typical of how easy handling becomes with Louden Monorail equipment . . . for lap handling from pickers to cards, beam handling to and from the slashers, weave loom beam to and from the tying-in machine, loom beam handling in the weave room, roll or bale handling in finishing, and both beam and cloth handling in the dye house.

There are few departments of any mill where Louden Monorail Handling will not increase efficiency, quickly reflected in profits. Write for new, illustrated booklet, "Economical Material Handling", sent without obligation.

THE LOUDEN MACHINERY COMPANY, 303 COURT STREET, FAIRFIELD, IOWA

CARDING AND SPINNING *Efficiency* DEPENDS ON WHAT HAPPENS *Here!*

Leading woolen mills wisely select their wool oils with extreme care. The reason, of course, is that they know how much the oil's performance governs the success of the many operations which follow.

A good wool oil, properly applied, can substantially step up carding and finishing efficiency. Its efficient performance is noticeable all down the line—even to the finished goods.

And this explains why woolen mills in increasing numbers are changing to Proxol.

Proxol emulsions are unusually stable. In carding, there's less waste, less static, less fibre breakage, no corrosion. In spinning, there are fewer ends down. You get stronger, more uniform yarns.

Proxol undergoes no change when it's on your wool, yarn or fabric. It won't heat up on storage . . . it develops no odors or discolorations. Its safety matches its efficiency.

Try Proxol. Its consistent use means smoother operation . . . greater production.

PROCTER & GAMBLE PROXOL MADE IN U.S.A.

Procter & Gamble
CINCINNATI, OHIO

. . . made by the makers of Olate, the safe, efficient, all-purpose textile soap.

You can speed up many Textile Processes

WITH ALSIMAG® CUSTOM MADE

ROLLERS AND PULLEYS

The smooth AlSiMag Roller or Pulley type guide rolls as the yarn travels over it. The smoothness of the guide plus the rolling action enables you to obtain the least possible yarn tension. This can give you:

1. Greater speeds.
2. Better yarn control at higher speeds.
3. Less possibility of yarn or filament fracture.

AlSiMag Roller or Pulley type thread guides are custom made. They can be made for metal or AlSiMag axles for comparatively low speeds. At higher speeds it is advisable to carry these guides on oilite, ball, roller or other type of lubricated non-friction bearing. AlSiMag is harder than metals usually used for axles. AlSiMag is homogeneous, has no surface skin to wear through and cause guide failure.

GROOVES, SIZES, TOLERANCES. Since these AlSiMag guides are custom made, you may design for utmost performance. However, long multiple groove guides encounter the warpage problems inherent in ceramics.

If the length of the guide does not exceed the outer diameter by more than ten times, a normal camber of 0.006" can normally be expected. Example: ½" O.D. x 5" long with average number of grooves should be within a total of 0.030" camber. If closer tolerances are necessary, consult our engineers.

HAND MADE SAMPLES can be made to your design at reasonable cost. Try out your ideas and keep a record of the service of these super long wearing AlSiMag guides. Records indicate that you will find AlSiMag guides far lower in cost per pound of yarn processed.

49TH YEAR OF CERAMIC LEADERSHIP

AMERICAN LAVA CORPORATION

CHATTANOOGA 5, TENNESSEE

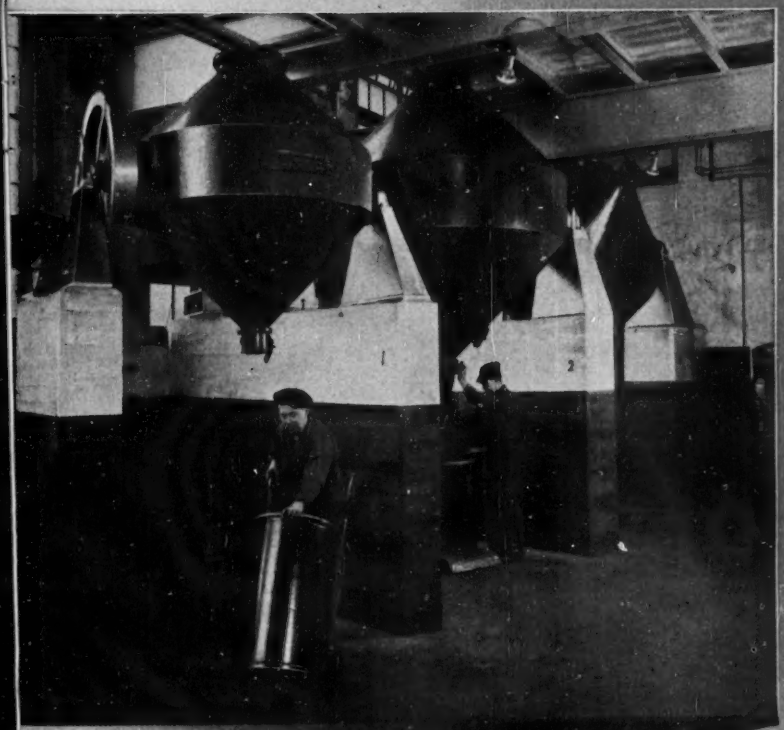
OFFICES: METROPOLITAN AREA: 671 Broad St., Newark, N. J., Mitchell 2-8159 • CHICAGO, 228 North LaSalle St., Central 6-1721
PHILADELPHIA, 1649 North Broad St., Stevenson 4-2823 • LOS ANGELES, 232 South Hill St., Mutual 9076
NEW ENGLAND, 38-B Brattle St., Cambridge, Mass., Kirkland 7-4498 • ST. LOUIS, 1123 Washington Ave., Garfield 4939

TEXTILE BANKING COMPANY, Inc.

Factoring Service

Puts your sales on a cash basis
Strengthens your cash position
Relieves you of credit losses

55 MADISON AVENUE • NEW YORK



GIANT BLENDERS mean more uniform results, to give you a SUPERIOR PRODUCT

This series of powerful Giant Blenders is another example of the special equipment throughout our entire plant built to comply with our own specifications. These blenders make possible more uniformity in standardization of the dyes. Thanks to our more uniform methods of dye-making, Althouse superior dyestuffs enable YOU to produce a superior product!

ALTHOUSE
Chemical Company, Inc.
READING, PENNSYLVANIA

America's First Name in Super Light-Fastness

Smooth Supple Hand

LUPOMIN

An Effective Cation Active Softening Agent for Uniform Finishes

Lupomin (Improved) is the latest development in textile softeners suitable for use on a wide range of fabrics. A very small quantity of Lupomin gives a supple and smooth hand and assures drapy fabrics with an odorless finish. Lupomin is equally effective in a neutral or acid bath and mixes with gelatine, gums, starches and dextrines. For brighter shades, fast colored discharges, Lupomin will save you time and money when used on cotton, linen, silk, wool, synthetic fibres and mixed fabrics. It is available in both paste and powder form. Complete data on the versatility of this effective softening agent as well as a sample for a test run may be had for the asking.

JACQUES WOLF & CO.
Chemicals PASSAIC, N. J.

Carlstadt, New Jersey
Los Angeles, California

FPG

AN IMPORTANT ANNOUNCEMENT

to Manufacturers, Processors and Shippers of

PRODUCTS IN ROLLS

After exhaustive surveys of the industry's needs and after long experimentation, our engineers have designed a line of Winding and Slitting machines which embody a number of important improvements.

Higher speed, less floor-space requirement and sturdier construction are only a few of the features which distinguish our machines from similar equipment available today.

These machines are now in production.

If your company is contemplating the purchase of Winding and Slitting equipment, to expand present facilities or to replace old-type, less efficient machinery, we suggest that you investigate the advantages and money-saving features of our new Winders and Slitters.

Bagley & Sewall's hundred year experience and outstanding record in designing and building this type of equipment is your advance guarantee of complete satisfaction.

BAGLEY & SEWALL

WATERTOWN, NEW YORK

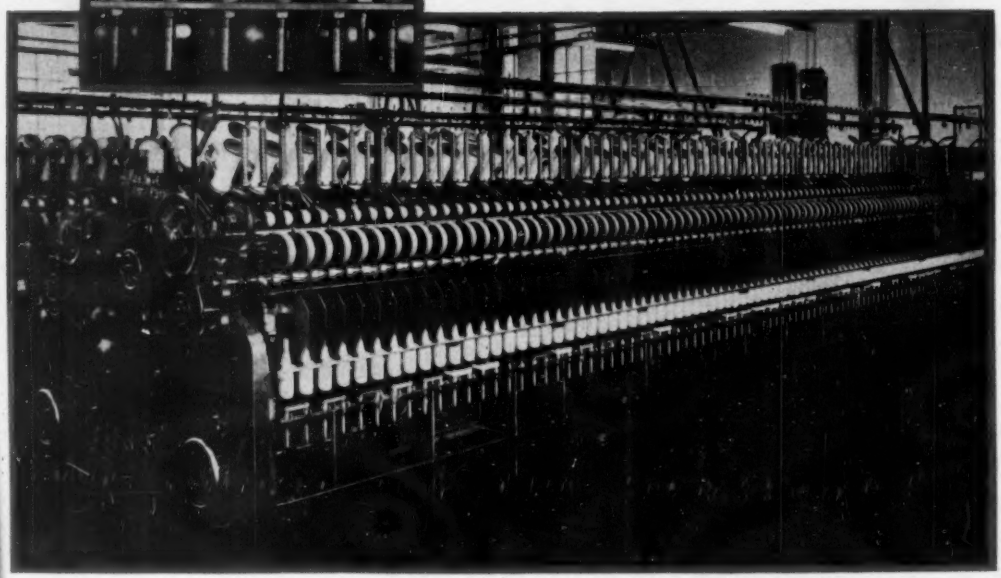
DESIGNERS and BUILDERS of QUALITY MACHINERY Since 1853

500 FIFTH AVE., NEW YORK 18, N. Y.

Marquette ROLLER BEARING SPINDLES

with FULL-FLOATING FOOTSTEP BEARING

For Cotton, Rayon, Nylon, Wool, Worsted



This New England mill, making fine quality worsted yarn, installed a test frame of Marquette Roller Bearing Spindles in 1945. Since that time they have purchased several thousand Marquette Spindles as required for frame change-overs.

Not only do Marquette Spindles aid this mill in maintaining its reputation for producing yarn of highest quality, but the mill's records also show that these spindles cut costs in two important ways. First, they effect a saving of 23% in power consumption. Second, the normal oiling schedule is 3,000 hours.

We'll be glad to prove the advantages of operating Marquette Roller Bearing Spindles in **your** mill. For a test installation, contact our home office or one of our representatives.

PROTECTED BY U. S. AND FOREIGN PATENTS, AND PATENTS PENDING

The Marquette METAL PRODUCTS CO.

CLEVELAND 10, OHIO

SUBSIDIARY OF CURTISS-WRIGHT CORPORATION

Representatives:

BYRD MILLER, WOODSIDE BLDG., GREENVILLE, S. C.

C. M. WHITT, 612 N. BESSEMER ST., GREENSBORO, N. C.

WILLIAM P. RUSSELL, BOX 778, ATLANTA, GEORGIA

JOHN A. HALLISEY, 50 LIVINGSTON AVE., LOWELL, MASS.

Also Manufacturers of: **HYDRAULIC GOVERNORS • FUEL OIL PUMPS • FUEL OIL INJECTORS WINDSHIELD WIPERS FOR AIRCRAFT, TRUCKS AND BUSSES • PRECISION PARTS AND ASSEMBLIES**

This month's editorial appears on page 103.

Textile Industries
Vol. 115 • Feb. 1951

News in Brief

Cotton Mills Need 100,000 More Employees. The cotton textile industry will require approximately 100,000 additional operatives, in the event of an all-out war effort. The manpower requirements were disclosed in a study made by Ralph E. Loper Co., of Greenville, S. C., and Fall River, Mass.

1951 Knitting Arts Exhibition on April 30. The 40th Knitting Arts Exhibition will be held in the Atlantic City Auditorium Monday to Friday inclusive, April 30-May 4, 1951. The National Association of Hosiery Manufacturers has announced that the KAE of 1951 is a complete sell-out. Contracts were let on all spaces five months in advance of the opening date.

Highest Earnings in Textiles. The textile industry will enjoy the highest after-tax earnings rate among big industries during the next five years, according to a statement by Royal Little, president of Textron, Inc. Until recently, the public would pay only the equivalent of working capital for textile shares; now the public is more inclined to pay the net value. Big textile mills, in a year such as 1949, earned up to 15 per cent on sales and up to 40 per cent on invested capital, he said.

Industrial Relations Improving. Labor - management relations are "fundamentally good and are improving," according to Leo Teplow, associate director of NAM's Industrial Relations Division. Despite some evidence to the contrary, employees and employers are making "real progress" in advancing their common interests and lessening the areas of friction, Mr. Teplow asserted.

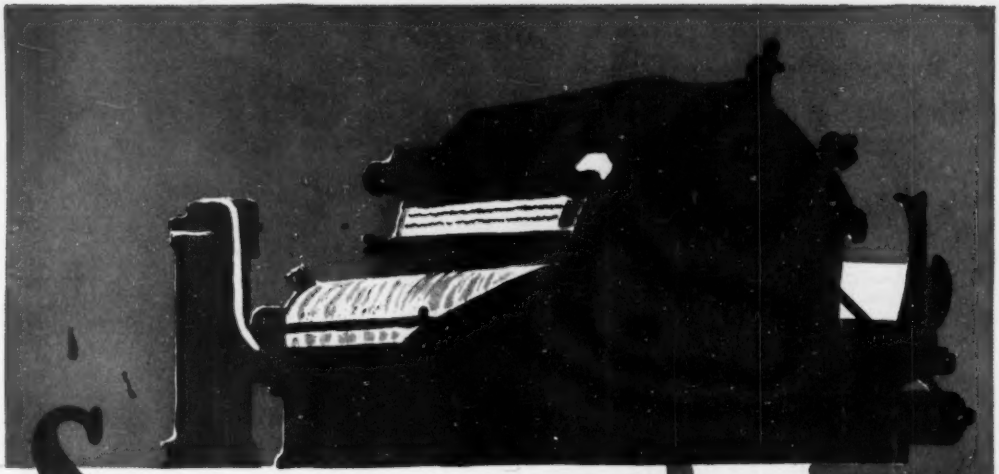
"Operation Silver Dollar." A special weekly payroll distributed more than $125,000 in silver dollars to 2,200 employees of Judson Mills, Greenville, S. C., in a plan to demonstrate the effects of textile payrolls on Greenville's economy. Special arrangements were made with the Federal Reserve Board to have more than 7,500 pounds of silver dollars shipped from the U. S. Government mint in Philadelphia. Alan B. Sibley, vice-president of Judson Mills, considered "Operation Silver Dollar" quite a success.

JEANINE HOLLAND

This brunette beauty from Houston, Tex., was named "1951 Maid of Cotton" at the National Cotton Council sponsored contest finals held in Memphis on Dec. 28.

"Excellently Managed" Mills. Two cotton textile manufacturers are among 238 firms, throughout the United States and Canada, which are being awarded "Certificates of Management Excellence" for the year 1950. The awards, made by the American Institute of Management, New York, will be bestowed annually hereafter by the Institute. The honored companies are: Cannon Mills Company, Kannapolis, N. C., and United Merchants & Manufacturers, Inc., New York.

QMC Textile Requirements. Cotton, wool, and synthetic textiles for the current procurement program will be delivered on the following totals to be completed by October 1, 1951, majority anticipated during first six months of 1951: 104 million yards cotton uniform cloth, 31 million yards wool, 14 million yards synthetics, 28 million yards of light fabrics for tentage, 24 million yards of duck, 134 million yards of webbing. Navy requirements for duck and webbing will increase the total for these two items. An additional 31 million yards of eight types of textiles for army and air force use will be procured under the wool reserve program. Details may be ob-



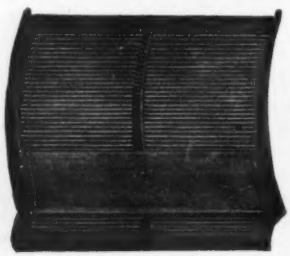
Stop Losing Dollars in Card Fly Waste!

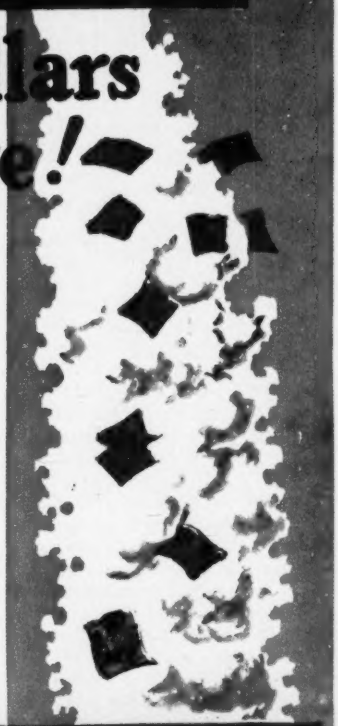
If you're finding good spinnable staple mixed in with the moats and trash under your cards, it's time you installed *Jenkins Card Screens.*

Jenkins card screens are engineered to set closely to your cylinder. Absolute uniformity in every part makes possible the perfect settings —impossible with inferior or damaged screens—which prevent excessive air current from blowing good staple into fly waste.

Improved grooving and patented grid bar construction, developed and used exclusively by Jenkins, assure you of maximum screen efficiency. Jenkins manufacturing and rebuilding service is backed by 37 years of experience, fully guaranteed.

You don't *have* to put up with costly, continuous waste under your cards. Why not talk to a Jenkins representative about it?





JENKINS

ENGINEERED PRODUCTS

JENKINS METAL SHOPS • GASTONIA • NORTH CAROLINA

tained from the New York Quartermaster Procurement Agency, 111 E. 16th St., New York 3, N. Y.

New Era For Wool. "We are on the verge of an era where we may expect science to contribute as directly to the techniques of wool manipulation as it has been contributing to the development of the supplies, the equipment, and the raw material which we are already using," said Giles E. Hopkins, technical director of The Wool Bureau at the Carders Guild of the National Association of Woolen and Worsted Overseers during the 67th annual convention in Boston; he stated further that the application of science to wool manufacture has been delayed because the wool industry has progressed so far as "an art or as a craft." Radical achievements are now being demanded, and the Textile Research Institute is conducting experiments in an attempt to link comprehensive research directly with mill investigation, he said.

Textile Trade Leads In Lubrication. Manufacturers of textile machinery and the mills were cited by lubrication engineers at the annual meeting of A.S.M.E. as leaders in recognizing the importance of controlled application of lubricants through centralized automatic systems. It was revealed by a *Fortune* magazine survey that as late as July 1949, only 10% of industrial plants had installed the system.

Clemson Receives $25,000 from Lowenstein. The Clemson Agricultural College, Clemson, S. C., has received a check for $25,000 to be used in modernizing the institution's textile school. Leon Lowenstein, chairman of the board of M. Lowenstein & Sons, Inc., presented the check to Dr. R. F. Poole, president of Clemson College.

Traffic Executives Group is Organized. Traffic managers, representing the textile industry, met at the New York Traffic Club recently to consider rate increases made by motor freight carriers. The Textile Traffic Managers Conference was organized at the meeting to act as a clearing house for information of interest to the textile industry and to provide a forum for discussion of problems with which the industry may be faced. John V. Hoey, traffic director of the National Textile Traffic Bureau, 40 Worth St., New York, was elected

News in Brief

chairman and executive secretary of the conference.

Atlanta is 2nd Best City for Testing Products. According to a study in test marketing by advertisers, Atlanta, Georgia, is now rated second-best in the nation for testing products, marketing techniques, and sales promotional ideas.

Board Proposed to Allocate Engineers. The Engineering Manpower Commission of the Engineers Joint Council has proposed the establishment of a National Engineering Personnel Board to make selections for military, civil defense, or industrial allocation from a reserve of men up to the age of 70 with training in one of the critical fields of engineering. The proposed reserve would be created through the registration by selective service of every man up to the age of 70 who has a bachelor's degree in one of the critical fields of engineering, or anyone enrolled in training for a degree in one of these fields, or anyone employed in one of these fields. The proposal was

HART COTTON MILLS HOLD OPEN HOUSE

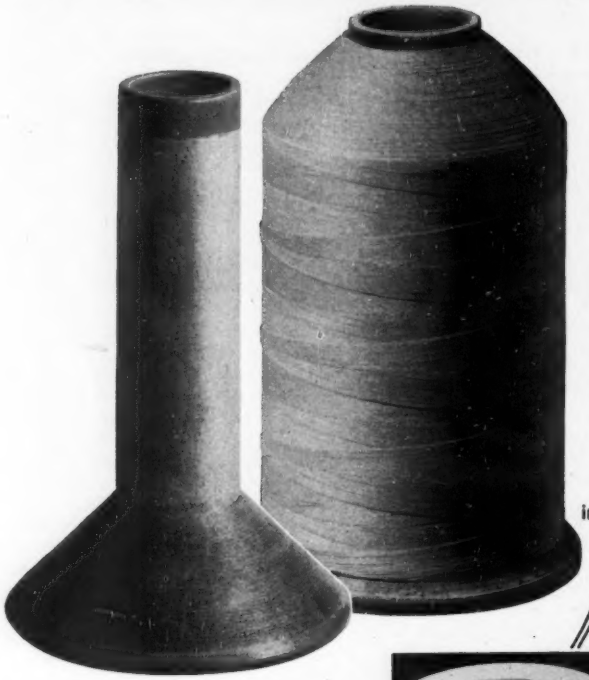
Hart Cotton Mills, Inc., Tarboro, N. C., held their first open house recently. It was attended by something over two thousand employees, friends, and citizens of the community.

The company has, since its purchase by Ely & Walker in 1945, completely modernized and enlarged the mill, investing over $3,000,000 in new machinery and equipment. There have also been 82 modern cottages built for the employees at a cost of half a million. The mill has been further improved by the installation of new air conditioning equipment.

The employment in the mill has increased from 235 in 1945 to 650, and the wage rates have increased 130%. At its current production rate, the plant produces 700,000 yards of print cloth fabric each week and consumes 17,500 bales of cotton yearly.

SERVING THE TEXTILE INDUSTRY SINCE 1899

FOR PACKAGING INDUSTRIAL THREAD

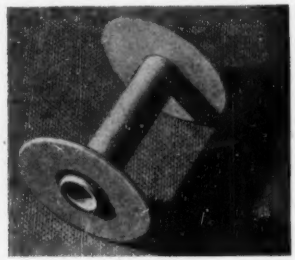


SONOCO
SINGLE HEAD SPOOL

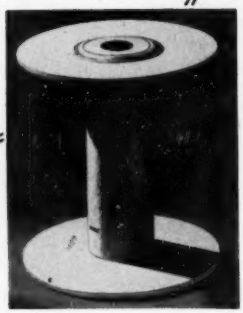
An original SONOCO development, the Single Head Thread Spool features a tapered base that allows even, trouble-free delivery to the sewing machine without "snagging" during "take-off."

Made in a wide range of sizes and special lengths. Colored lacquer tips can be ordered for identification... and special scoring and surfaces are available to prevent slippage of thread under unusual conditions.

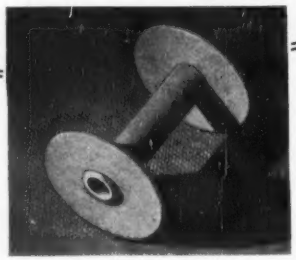
SONOCO SPOOLS
in various size head diameters and barrel lengths



P. E.—widely used for bias binding and other narrow fabrics. Can be sulphur-treated for greater durability.



F. F. M.—for winding braid, tape and cord. Features metal reinforced bushing.



BIAS—for winding light packages of bias binding and narrow tape. Crimped end construction.

Knitting Arts Exhibition
Atlantic City, New Jersey
April 30-May 4, 1951
Booth No. 373-374

sonoco — SERVES THE WORLD — PAPER CARRIERS
REG. U.S. PAT. OFF.

SONOCO PRODUCTS COMPANY

BRANTFORD ONT. · HARTSVILLE S. C. · MYSTIC CONN.

DEPENDABLE SOURCE OF SUPPLY

submitted to the National Security Resources Board.

Piedmont Division, STA, Reorganized. Meeting for the first time in over three years, the Piedmont Section of the Southern Textile Association elected Marshall H. Rhyne, gen. supt., Imperial Yarn Mills, Inc., Belmont, N. C., the new section chairman. Mr. Rhyne was the only officer elected at the meeting which was held in Fireman's Hall, Charlotte, N. C., on Dec. 3.

Plant for Fiber V Instead of Nylon. The Du Pont Company's 635-acre tract on the Neuse River, near Kinston, N. C., is to be used for the manufacture of Fiber V instead of nylon, according to a company announcement. The tract was purchased in September.

Citation for Designing Lint Cotton Cutter. Ralph A. Rusca, George J. Kyame, Charles L. Sens, and Ray C. Young, employees of the Southern Regional Research Laboratory, and Clarence M. Asbill, a former co-worker, comprise a group of scientists who received a citation for designing a machine to cut lint cotton into lengths suitable for use in making smokeless gun powder.

National Emergency Declaration Will Speed Defense Buying. The presidential declaration of a national emergency will accelerate defense buying and production in that armed forces secretaries can now authorize negotiation of purchases and contracts. More than 10,000 plants now have production schedules developed by agreement between management and munitions board production allocation program.

Extension of DO Ratings. The American Cotton Manufacturers Institute has pointed out that textile manufacturers without specific authority, other than the general provision of NPA Regulation No. 2, may automatically extend DO ratings on orders to the purchase of other materials, provided the items or materials sought are "physically incorporated in the material."

Evaluation of Fabric Flammability. Dr. H. E. Hager of General Dyestuff Corp., head of the subcommittee on flammability of consumer textiles, has reported that the AATCC flammability tester, as recently revamped, has been thoroughly tested and is considered a reliable instrument for evaluating flammability of fabrics.

British Wool Exporters Join Trade Center. The National Wool Textile Export Corporation of Great Britain, formerly at 743 Fifth Avenue, New York, has joined the organizations participating in the British Trade Promotion Center at 677 Fifth Avenue, New York. Work of the Corporation will be handled by the British Commonwealth Chamber of Commerce, which manages the British Trade Promotion Center.

Georgia Mill Men to Meet at Daytona May 16. The 1951 convention of the Cotton Manufacturers Association of Georgia will be held at Daytona Beach, Fla., May 16 to 18, according to T. M. Forbes, executive vice-president of the organization.

Knitted Glove Group Organized. The American Knit Handwear Association, Inc., has been organized with offices in Gloversville, N. Y. The organization succeeds the As-

ERWIN MILLS' RUFFIN ELECTED NAM PRESIDENT

William H. Ruffin, president and treasurer of Erwin Mills, Inc., Durham, N. C., was recently honored with the election as president of the National Association of Manufacturers. Another textile executive, Herman Cone, president of Cone Mills Corp., Greensboro, N. C., was named a director of that body.

Shortly after receipt of this information, the American Cotton Manufacturers Institute announced Mr. Ruffin's resignation as first vice-president of that organization. Mr. Ruffin made known his decision in a letter to George P. Swift, ACMI president, in which he stated:

"I feel compelled in justice to both the ACMI and NAM to resign as first vice-president of the American Cotton Manufacturers Institute and remove myself from what many in our group refer to as 'the line of succession.' To me no higher honor exists than the presidency of the ACMI.

"In the critical period that lies ahead, I believe I can accomplish much as elective head of the NAM to further the general objectives and promulgate the time-tested and proven economic principles of our industry. I think I am familiar enough with the programs of both organizations to risk the assertion that they are moving in the same direction and do not differ in any important detail. I would like to assure you that I will continue to take the same strong interest in ACMI affairs that I pride myself in having always taken."

Mr. Ruffin

News in Brief

sociation of Knitted Glove and Mitten Manufacturers. Officers are: James L. Cahn, Alma Knitting Mills, Inc., Gloversville, N. Y., president; Richard Rockwell, Ashe Manufacturing Co., New York City, vice-president; and Ralph O. Collins, Gloversville Knitting Co., Gloversville, N. Y., treasurer. Harry A. Moss, Jr., is executive secretary.

Variable Beat-Up Motion for Looms. Patent No. 2,514,603 has been issued to Marcus D. Haney, Spindale, N. C., for a variable beat-up motion for looms, whereby the effective throw of the lay is varied to thus vary the overall length of the pitman rods. The invention also relates to an eccentric connection between the pitman rod and the lay of the loom, whereby the stroke of the lay is varied in regular cycles in order to beat up two fillings in close proximity to each other, at the same time the warp threads are spaced apart from each other. Needle point canvas, lace cloth, and fabrics having a mesh effect can be woven in a conventional loom by using modifications of the patented arrangement.

PROPAGANDA WARNING GIVEN BY LABOR WRITER

American businessmen must do a better job of showing the public their real value unless they want to be "washed aside" by the Communist tide, according to Victor Riesel, labor columnist for the *New York Daily Mirror*. Mr. Riesel stated that business suffers from a "reputation it doesn't deserve," but does too little to counteract, and he said further:

"You're still suffering from the old reputation—never deserved except in a few infamous instances—that you handle your labor relations with tear gas and your employees' complaints with machine guns."

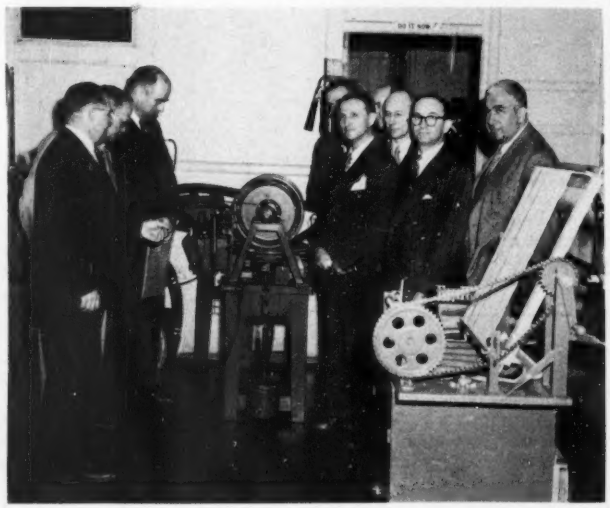
Businessmen should stop apologizing for profits because "no one except a few leftists expects you to apologize." Profits are something to be proud of, because they show that the business is being well run, according to Mr. Riesel, whose reports are syndicated to 156 papers with about 24,000,000 circulation.

Businessmen must police themselves if they are to stop supplying propaganda material to their enemies, he declared. They ought not ship to the Orient, because that "gives the Commies the chance to say that Americans will sell to anyone—even guns to be used in shooting their own sons—in order to earn a dirty dollar."

CARPET MANUFACTURING VIEWED BY AATT MEMBERS

A. G. Ashcroft (left), director of research and development at Alexander Smith & Sons Carpet Co., explains the operation of a wear testing device in the company's laboratory to a group of visitors representing the American Association of Textile Technologists.

Nearly 65 members of the Association participated in the recent field trip to this large carpet manufacturing plant in Yonkers, N. Y.



Apparatus for Applying Decalcomanias to Hosiery. Patent No. 2,501,539 has been issued to James A. Ruth, High Point, N. C., for an invention which transfers decalcomanias or printed matter to hosiery. An operator places stockings on a conveyor, and the stockings pass along with the conveyor between a pair of superposed rollers. The upper roll is heated. Decalcomanias pass beneath the heated roller and upwardly to other friction driven rollers for taking up the tape. The heated roller transfers decalcomanias or printed matter to the stockings.

Southeastern AATCC Meet. Talladega, Alabama, will be the scene of the February 24th meeting of the Southeastern Section, American Association of Textile Chemists and Colorists. Technical session in the afternoon will feature a symposium on various continuous methods of vat dyeing; place—Alabama Power Co. auditorium. Dinner is scheduled at the Purefoy Hotel.

(*More News Briefs on page* 243)

AN EXECUTIVE Views

THE NEWS IN TEXTILES

Prepared by a man who is closely identified with the textile industry.

Military Strength— What Strength?

A GREAT DEAL of loose talk is being scattered about these days to the effect that this country should throw its weight around in all different directions and demand this and that and the other and make threats about what it will do if its demands are not met. Of course, by the time you read this, the whole international powder keg may have blown sky-high and the United States may be engaged in the most vicious war in its history. Even in retrospect, however, it may be well to make a few remarks about what has happened to us in the years since the troops came marching home in 1945 and 1946.

You will recall that at the end of World War II, we had something like 10 million men in uniform. As soon as the war entered its last stages, the wails began to go up that we should get the boys home by Thanksgiving, by Christmas or, at least, just as soon as possible. Those who were in the military services felt that they were wasting their time, and it was quite natural that their cries should be mingled with the general hubbub insisting that the Army, the Navy, the Air Force and the Marines be practically dissolved and preferably within no more than one week's time.

This is not said in criticism, because no doubt it was a natural feeling on the part of all of us, and it was even more natural because our leaders in Washington were busy telling us that the Russians were really our friends and that after all the free enterprise system had quite a few rips in its fabric. Reds, pinks, fellow travelers, writers for *The Daily Worker*, and others of similar stripe were being lauded and praised in Washington, and one or two turned up in some of the highest administrative posts in the government service.

The Russians, on the other hand, were a little more realistic. Instead of sending their troops home, they kept them on and continued their training. Knowing what we do now, it is difficult for us to keep from blushing when we think of what fools we American people were.

The Missing Legions

That brings us up to the year 1951. It is no secret that when war broke out in Korea the United States had ten divisions. Seven of these were committed to making Korea safe for South Koreans. We have no direct pipeline to the Pentagon, but it is now apparent to all of us that the men in those seven divisions, constituting the bulk of the American Army and Marine forces, have been fighting for their very lives, and by and large many of our citizens are no longer particularly concerned about who gets Korea.

In like manner, we do not give any aid or comfort to the enemy by noting that there are two American divisions in Germany, because that announcement has already been made. What some of us do not know (this information has also been made available to the enemy) is that in these 48 states we have only one regular combat army division to defend us. Four National Guard Divisions were called in a few months ago, and two more were ordered to active duty a few weeks later, but divisions cannot be whipped into fighting shape that quickly.

There we have the sad picture of American military might. Seven divisions in Korea, two divisions in Germany, and one division in the United States—these were the weapons we carried in our hands as we swaggered across the face of the globe preaching that we would make the world safe for democracy and free enterprise, and that we were going to guarantee the Four Freedoms, as well as numerous other freedoms, to millions of people everywhere.

Opposing these ten divisions (as you probably know, the strength of a division varies from something like 10,000 men to approximately 18,000 men), the Russians are said to have a well-trained, experienced force of somewhere around 300 divisions. It was recently said in jest that if Stalin decided to throw some of these divisions across the Bering Strait, down through Alaska and down our Pacific Coast, nothing would stand in his way except the San Francisco police department. The irony of the matter is that this is just about the way matters stand.

Our Own Freedom

Now the reason for this pessimistic dissertation upon American military strength is not to cast our readers into a state of gloom nor to make them feel that we should send a wire to Stalin, telling him that we don't want to fight and either he can come in and take the country or we will give it back to the Indians. We do, however, want to impress upon you the fact that we are in this sad predicament because we had a government whose representatives continued to talk

Announcing—

two new Thorobred "running mates"—

the amazing new

DAYTON THOROBRED PICKERS

that last up to 200% longer!

Now, as the result of 12 years of product improvement and development, Dayton introduces the greatest advance in picker performance since rubber pickers were introduced to the textile field by Dayton.

These two new Dayton Pickers—the "Premium" and the "Super"—combine more durable fabrics and compounds, with these improved design features: rounded front edges that eliminate hanging filling; narrow back that permits free non-wear on lay-in strap; flared bottom that makes picker stick easier to apply.

Intensive testing in laboratory and mill preceded announcement of these new pickers. Tested against all other makes of pickers, they consistently outlasted them, often as much as two times! Cut down-time in the picking operation by the same amount, increased cloth production. Shuttles lasted longer, too, because these pickers run cooler. For high-speed looms as well as older types.

Turning out millions of new fashions in fig-leaves
is a big, year-round job for the mills of America. Dayco and Thorobred textile machinery products help turn them out economically for the consumer, profitably for the mill-man.

The Dayton Thorobred Premium Picker

is the pick of the picker crop—the absolute ultimate in quality. Its silvered back is your assurance of sterling picker performance.

The Dayton Thorobred Super Picker

will "out-pick" any ordinary picker on the market. Outstanding in the regular field. Look for its red back—your guarantee of super performance.

Dayton Drop-Box Pickers are "three-ways" better

Improved at the three vital points of picker operation: Extra-hard at the spindle hole; firm but with "give" around the picker stick hole; soft for shock-absorption at the shuttle contact area. Available in reversible and non-reversible types.

The Dayton Thorobred Lug Strap

can take millions of flexings, millions of picker stick blows without "fatigue," without stretching. The built-in cushion protects cam points and picker sticks. Temperature and humidity changes won't affect them. (Did you see the recent tests of this Lug Strap against three common types of strap? The Thorobred outlasted every one!)

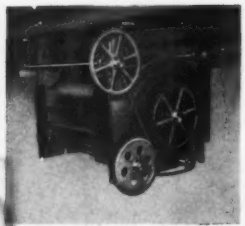
If you would like to see the last word in modern high-speed pickers, ask your Dayton Distributor or salesman, or write: *The Dayton Rubber Co., Textile Division, Woodside Building, Greenville, S. C.*

Dayton Rubber

Textile Products for better Spinning and Weaving

FOR CONTINUOUS HIGH-PRODUCTION TOP-QUALITY CLEANING...

SQUIRREL CAGE DUSTER by SARGENT



SARGENT'S *Ceiling Condenser — Model 20, single cylinder, 18" or 36" diameter cylinders.*

SARGENT'S *Automatic Feeder for scouring machines, openers, pickers, dusters, etc.*

SARGENT'S *Heavy Duty Mixing Picker — rugged, high-production unit.*

SARGENT-designed for continuous dusting of card waste, grease wools, carpet wools . . . highly efficient for blending . . . absolute minimum of broken fibres . . . variable speed control . . . available with enclosed housing and exhaust fans for removal of dust as it is separated from fibres . . . DUSTER may be set on sub-base with drag conveyor for continuous dust removal from under machine . . . the ideal line for peak, quality production consists of bin-type feeder, mixing picker, SQUIRREL CAGE DUSTER and ceiling condenser.

UNIFORMLY OPENED AND CLEANED WOOL MEANS EASIER, LESS EXPENSIVE SCOURING AND BETTER CARDING

SINCE 1852

LARGEST MANUFACTURERS OF STOCK DRYING AND WOOL WASHING EQUIPMENT IN AMERICA

C. G. SARGENT'S SONS CORPORATION

Graniteville, Massachusetts, U.S.A.

REPRESENTATIVES

F. E. WASSON — 519 Murdock Rd., Philadelphia 19, Pa.
A. L. MERRIFIELD — 215 Grove Ave., Cincinnati 15, Ohio
W. S. ANDERSON — Carolina Specialty Co., Charlotte, N. C.
M. F. BECKER & ASSOCIATES — 122 So. Michigan Ave., Chicago, Ill.
HUGH WILLIAMS & CO. — 47 Colborne St., Toronto 1, Canada

big and to point an empty cap pistol, while they knew there was nothing with which to back up either the talk or the cap pistol.

We had a government whose representatives talked in high-flown terms about freedom from this and that, who spent millions and billions of dollars—for example, how many Americans realize that tax collections in 1949, before Korea, were higher than the peak tax collections of World War II?—for all sorts of social welfare projects, while all the time the Fox of the Kremlin was laughing up his sleeve because he knew that social welfare can be a very hollow mockery for a defeated nation.

The blame rests on all of us who are of voting age. Such people as we have sent to Washington do not go there unless they are elected, and they would not be elected if enough intelligent people would take the trouble to go to the polls. We have gotten ourselves into a sad and sorry mess, and only the production efficiency of American industry is going to save us.

In this connection, it is intensely interesting to recall how only a few months ago the people in Washington were saying that "big business" was throttling the American nation. They are not saying that now. The only remarks they are addressing to "big business" now are questions about how soon can you give us three times as much as you said you could produce, in one-half the time. No business in America is too big in the year 1951.

The Big "A"

Whenever talk of American military strength comes up, the more smug of our citizens remark that we do not have anything to worry about because when we dropped the atom bomb on Hiroshima we rose to a military supremacy that will be unchallenged for years to come, and they say that no nation would dare attack America as long as we have The Bomb. Of course, later events have proved this reasoning to be fallacious because a strictly third- or fourth-rate power massed enough troops on the Korean peninsula to show us that the atomic bomb was not enough.

It is difficult, of course, to use such a weapon in an actual combat zone because you can't drop a bomb that will kill nothing but Chinese Communists. The battle lines are not that far apart. To use The Bomb on Russian cities involves a flight of considerable distance as well as of considerable peril.

Thus, we can no longer rely smugly upon this weapon, especially in view of the fact that its possession is no longer an American monopoly.

The Textile Industry

What has all this to do with the textile industry? The main thing that it has to do with it is that at the peak of the last war 61 per cent of the production of the cotton goods branch alone went to our armed forces and those of our allies. If we have another major war, it is already evident that we shall enter it with greatly reduced stocks of raw cotton and with an alarming scarcity of raw wool.

We know, too, that no war can be fought in these days without severe economic controls. Fundamentally and historically, the textile industry is opposed to controls, and yet the orders and regulations are already with us and it appears that many more are yet to come.

Another important consideration to our industry and to the rest of the country is whether or not we can undergo an all-out war and still maintain our democratic form of government. To win the war will be difficult enough, but to win the war and maintain our democracy is going to be one of the most difficult tasks our people have ever faced.

It has been said that next to iron and steel the textile industry is the nation's greatest defense industry. That means that our mills are particularly sensitive to a wartime economy.

And Now—1951

These are some of the things this writer sees ahead of us as we go into the year 1951. This is a time of great decision for America and for the world. Before the year is out, the die may have been cast. Ahead of us we have many a Rubicon to cross, and how we cross will determine the fate of this nation.

Feb. 7-9—**Cotton Research Clinic,** sponsored by National Cotton Council, Pinehurst, N. C.

Mar. 4-8—12th annual **Southern Safety Conference & Exposition,** Birmingham, Ala.

Mar. 14-16—Spring meeting, Committee D-13 on Textile Materials, **American Society for Testing Materials,** New York, N. Y.

Mar. 29-31—2nd annual meeting, **American Cotton Manufacturers Institute, Inc.,** Greenbrier Hotel, White Sulphur Springs, West Virginia.

April 2-5—Spring meeting, **American Society of Mechanical Engineers,** Atlanta Biltmore Hotel, Atlanta, Ga.

April 12-14—Annual meeting, **Alabama Cotton Manufacturers Association,** Hotel Buena Vista, Biloxi, Miss.

April 17-20—20th **National Packing Exposition,** Auditorium, Atlantic City, N. J.

April 28-May 5—**National Cotton Week.**

April 28-May 20—**International Textile Exhibition,** Parc des Expositions, Lille (Nord), France.

April 30—47th annual meeting, **National Association of Hosiery Manufacturers,** Claridge Hotel, Atlantic City, N. J.

April 30-May 1—14th **Hosiery Industry Conference,** Claridge Hotel, Atlantic City, N. J.

April 30-May 4—**Knitting Arts Exhibition,** Atlantic City (N. J.) Auditorium.

April 30-May 4—**National Materials Handling Exposition,** International Amphitheater, Chicago, Ill.

April 30-May 11—**British Industries Fair,** London and Birmingham, England.

May 16-18—Annual convention, **Cotton Manufacturers Association of Georgia,** Sheraton Plaza Hotel, Daytona Beach, Fla.

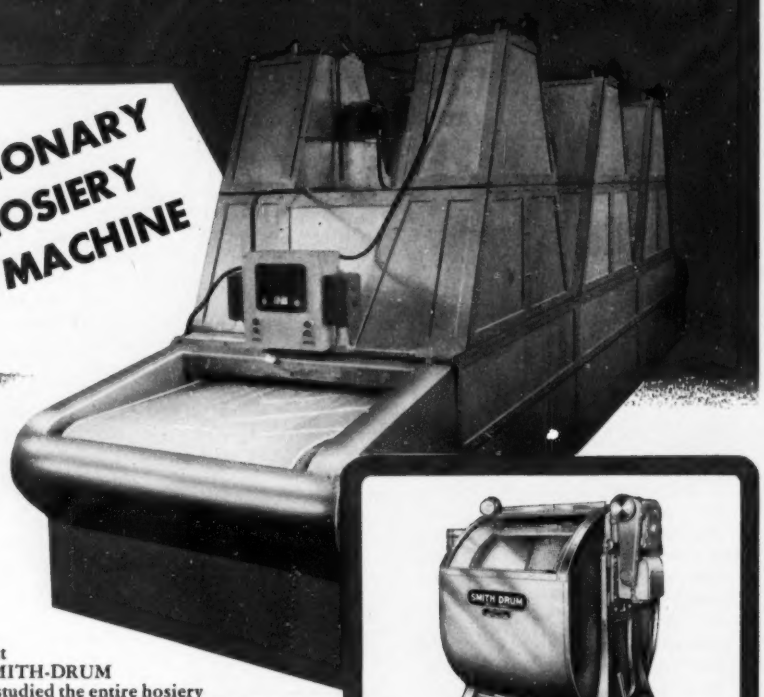
June 18-22—Annual meeting, **American Society for Testing Materials,** Chalfonte-Haddon Hall, Atlantic City, N. J.

Oct. 4—Sixth annual meeting, **Carded Yarn Association, Inc.,** Carolina Hotel, Pinehurst, N. C.

Oct. 17-19—Annual convention, **American Association of Textile Chemists and Colorists,** Hotel Statler, New York, N. Y.

Another SMITH-DRUM SERVICE to the Hosiery Industry!

REVOLUTIONARY NEW HOSIERY DRYING MACHINE



When nylon hosiery first made its appearance, SMITH-DRUM engineers immediately studied the entire hosiery dyeing and finishing process to determine if any changes should be made in existing equipment to handle the new fiber. We found that our regular hosiery dyeing machines were perfectly satisfactory for nylon hosiery. However, in conjunction with the Universal Dye Works, we developed a new method of finishing which completely eliminates the costly post-boarding process. The result of this work, covering a period of several years, is the recently announced and revolutionary SMITH-DRUM Nylon Hosiery Drying Machine. The first working model of this machine has been in daily operation at the Universal Dye Works for over a year, where it has *proved* its tremendous advantages over present post-boarding and drying equipment.

A full-size production pilot machine is also in operation at the Berkshire Knitting Mills, Reading, Pa. Production per operator is four to five times the usual rates . . . percentage of seconds is greatly reduced . . . the desired dull appearance is obtained . . . there are no forms to be cleaned . . . less floor space is required. Write promptly for complete information.

A WORTHY RUNNING MATE for this World Famous Hosiery Dyeing Machine

For over 35 years, the SMITH-DRUM Hosiery Dyeing Machine has been the accepted standard of the hosiery industry. Constantly improved in design and construction, it has always maintained its position of leadership in performance, long life and minimum operating and maintenance costs. It handles nylon, rayon or silk hosiery with equally satisfactory results.

SMITH, DRUM & COMPANY

Allegheny Avenue at 5th Street, Philadelphia 33, Pa.

Shorts and Remnants

The How at Joanna . . .

"Please send us four copies of the article in your November issue on 'How Joanna Reduced Waste' by Joseph L. Delany. We found the article very interesting and would like additional copies."—I. W. Garrett, J. P. Stevens & Co., Carter Fabrics Operating Group, Greensboro, N. C.

" . . . interested in waste program on page 87 of November . . . appreciate if you would send 6 copies."—C. A. McAbee, superintendent, Huntsville (Ala.) Mfg. Co.

" . . . just finished reading 'How Joanna Reduced Waste' . . . enjoyed very much . . . send 12 copies of the article . . . would like to know the engineering company that set up Joanna's waste program." — T. L. Phelps, ass't. prod. mgr., Rocky Mount (N. C.) Mills.

" . . . may we apply for reprint . . . "—F. Vogel, J. & P. Coats (R. I.) Inc., Pawtucket, R. I.

" . . . please send me copy . . . "—J. B. Baker, mgr., Pelzer Mills, Pelzer, S. C.

► Reprints available. Joanna does things other than reduce waste; keep your I on TI.

Splicing Plied Yarn

"December 1950 contains 'Splicing Plied Yarns' which was of interest to us . . . possible to furnish us two more copies . . . advise price . . . "

WILLIAM W. JOHL
President
William Johl Mfg. Co.
Sewing Threads
Mystic, Conn.

► Clip sheets supplied.

Perform Real Service

" . . . reading your editorial in December issue (Let's Get the Facts) . . . think you have performed a real service to the industry with your survey [Trends Indicated in Industry Area Survey; TI May through December 1950; reprints available]."

THOMAS D. YUTZY
Textile Committee on
Public Relations
New York

► Yutzy and his associates are performing a real service for the textile industry in the field of public relations; even those mills which do not financially support the program reap benefits.

► And while we're tossing bouquets, have you seen the recent issue of "Textile Technology Digest" from Institute of Textile Technology. 'Tis a "must" for busy executives and production men.

Reviving Visit

". . . guess you had better come up for a visit and we will show you how ordinary cotton mills are operated. I fear the influence of the Talmadge regime and the 'Song of the Chattahoochee' have lulled you into a character that is sadly in need of reviving."

NAME WITHHELD

► Reviving appeals to us. Citizen will be visited.

"Compressive Shrinking"

". . . greatly appreciate copy of 'Compressive Shrinking' by Paul V. Seydel."

H. NOWELL
Technical Engineer
Dominion Textile Co., Ltd.
Montreal

► Available in reprint form either from the editors or Seydel-Woolley & Co., Atlanta.

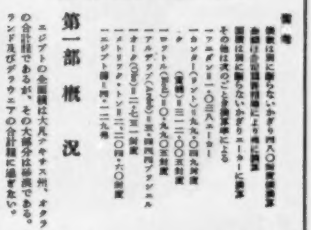
Loom Article

". . . six reprints of an article appearing in the September 1950 issue . . . 'Loom Reconditioning Program at Tallassee Mills' . . ."

V. H. BRUNEAU
Dir. Mill Planning
Canadian Cottons, Ltd.
Montreal

► Reprints available for interested readers.

INTERESTED IN JAPANESE TEXTILES?



The above message is extracted from "Monthly Report of Japanese Cotton Spinning Industry" which reaches us regularly. In view of American mill interest in Japanese textiles, we bring you this passage.

Employee Publication

" . . . would like to order 3,000 reprints of Mr. Carriere's article 'The Employee Publication—an aid to good community relations' which appeared [April 1950] . . . inscription should be placed . . . 'presented to members by International Council of Industrial Editors.' "

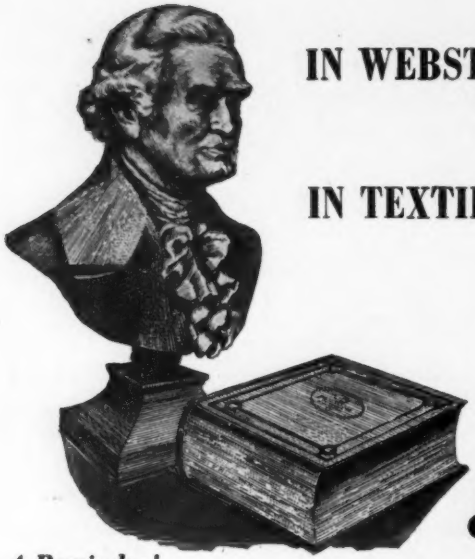
C. S. BOLEN
President
International Council of
Industrial Editors

JIM ANDREWS

Assistant Business Manager

Introducing J. T. "Jim" Andrews, TI's assistant business manager. After graduating from Ga. Tech, much of Jim's "business experience" was with Uncle Sam and his business of eliminating Japs from Midway to Tokyo, first on destroyers and then as a fighter pilot.

Jim was district manager for Simplex Time Recorder Company and when we caught up with him he was a departmental superintendent for Cluett, Peabody. Jim has a very charming wife and a three-year-old daughter, both of whom are TI enthusiasts.



IN WEBSTER'S "VAN" means . . . those in the lead.

IN TEXTILES, "Van Vlaanderen" means the leader in dyeing and finishing equipment.

For nearly fifty years Van Vlaanderen has always been a step ahead—in design, in workmanship and in service.

A Reminder!

Whether you need a single machine or an entire plant, Van Vlaanderen engineers are ready to help you.

A partial list of our equipment is shown below

Acetate Boil-off & Setting Equipment • Acetate Tricot Presetting Machines • Agers • Apron Conveyors • Back Riggings • Batching Stands • Back Washers • Beamers • Bleaching Equipment • Boil-off or Degumming Machines • Calendars • Caustic Conveyor Machines • Coating Machines • Continuous Washers • Cottage Steamers • Cotton Back Finishing Machines • Decating Machines • Decating Blankets • Doubling • Tubing Machines • Dye Jigs & Reels • Examining & Measuring Machines • Extractor Loaders • Full Width Machinery • Greige Goods Washers • Greige Goods Winders • Electric Guides • Hydraulic Calendars • Hydraulic Pumps • Initial Wet Treatment Machines • Jigs, All Types • Laminating Machines • Measuring Machines • Nylon Heat Setting Machines • Padding Machines • Palmer Tenter Units • Resin Impregnators • Rolls, Rubber, Paper, etc. • Roller & Knife Coating Machines • Rolling Up Machines • Rubber Extractors • Scutchers • Second Hand Equipment • Slack Print Washers • Submerged Type Scouring Units • Take up arrangements, constant speed • Tensionless Constant Speed Dye Jigs • Tentering Frames & Clips • Tricot Presetting Machine • Tubing Machine.

VAN VLAANDEREN

MACHINE COMPANY

370 Straight Street, Paterson 3, New Jersey

Cable address: Vlaanderen, Paterson, U.S.A.

World's largest manufacturers of machines for processing modern fabrics

Textile Industries
Vol. 115 • Feb. 1951

This Issue: Modern Production Methods

What Is This Issue?

This Modern Production Methods issue is a compilation of case history reports, primarily on equipment performance; it contains a number of short, to-the-point articles which tell how mills increase production and productivity; lower operating costs; reduce waste; improve quality; and secure improved operating conditions—

—by using modern equipment and accessories or by physical adaptation and modification of available equipment.

Who Supplied The Information?

For the most part, the data for the stories were collected by the editors during interviews with mill presidents, vice-presidents, managers, superintendents, technicians, departmental supervisors, and the employees who operate the equipment—often from several persons. Their opinions and operating procedure are recorded.

Some of the items were prepared by the mill men at our request; the experiences are firsthand.

Suppliers of equipment or their representatives were also contacted for information. Photographs were made. Sketches were prepared.

The editors visited mills from Maine to Georgia. Often different editors discussed the use of the same equipment with several mill men.

What Is In The Issue?

Briefly, here is the type information secured:

Quicker and easier handling methods; reduction of labor effort and cost; better housekeeping systems; easier changing of number; better preventive maintenance; less crowding of equipment; and conservation of floor space.

Also, more adequate cleaning methods; reduction of seconds; control of processes; improved storage facilities; better check on goods shipped; less variation in processing; reduction of waste; and improvement of quality.

As a service to the reader the name of the equipment manufacturer is given; procedure is described; results cited; and when possible the return on the investment is offered.

How Can Issue Be Used?

The editors believe that with the information given, this issue alone will serve a useful purpose. But it is suggested that it be used in conjunction with the November 1950 issue, in which the equipment made available during the previous year was described.

For those who have saved their copies and who wish to make a comprehensive check on equipment available and equipment performance, we recommend as a basis the February 1949, February 1950, and the October 1949 issues, also.

The report of the Atlantic City Show in the July 1950 issue will, in addition, prove helpful.

Our Thanks!

The editors deeply appreciate the time and effort of the mill men and suppliers who made this issue possible. Participation and cooperation in the dissemination of information for the betterment of the entire textile industry is a credit to the mills.

So long as we have this spirit, our industry will continue to advance and profit.—J.C.F.

Please turn the page

Dependable Strength

Textile Spring-Beard Needles are outstanding for strength. A special steel formula, superior tempering and scientific controls—automatic and electronic—give Textile Needles the right combination of strength and flexibility for dependable performance in your needle bars.

Strength is just one of the many advantages you get in Textile Spring-Beard Needles. You can see the results in better fabrics, increased profits.

TEXTILE MACHINE WORKS, READING, PENNA.

Textile
SPRING-BEARD NEEDLES

For Full Fashioned and Warp Knitting

Again this year Textile Industries *presents*

Modern Production Methods

—a compilation of case history reports

Telling the methods by which mills save labor, reduce waste, simplify jobs, improve quality, and increase production.

(Editorial commenting on this special issue appears on page 103)

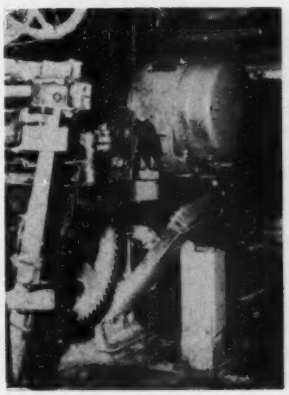
Case 1

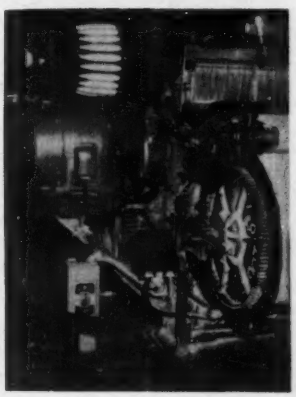
Smoother Loom Operation Obtained with Flywheel Type Motors

WHEN 90 new 44-inch Draper Model X-2 looms were installed in Graniteville Company's Hickman Division weave room during November and December of 1949, they were fitted with flywheel type loom motors marketed by the General Electric Company.

These ¾ hp, 1750 rpm motors, through a pinion and gear, drive the looms at a speed of 178 picks per minute.

It has been the experience of this mill that looms equipped with the flywheel type motor definitely have a smoother "feel" than those driven with motors that do not have flywheels; that is, the lay operates more smoothly. When a hand is placed on the lay of an operating flywheel motor driven loom and its motion compared with that of the lay of a loom driven by a non-flywheel loom motor, there is less variation of





FLYWHEEL TYPE MOTOR installed on one of the Graniteville Company's Hickman Division 44-inch, Model X-2 looms. Photo at the left was made from the front of the loom. Flywheel is enclosed with cover on right end of motor. View of motor from rear of loom is presented at right. Note pedestal type loom switch on floor; also guard rail to protect switch and motor from damage by trucks moving in alleys.

speed—the "jerky" feeling is eliminated.

Tests conducted by mill electricians indicate that the flywheel type motor has a better power factor, resulting in savings in the form of reduced power costs.

In addition, it was possible to reduce the horsepower rating of the motors fitted with flywheels. One horsepower motors are used on all individually driven looms in this mill except those equipped with flywheel type motors—these motors are rated at ¾ hp.

Maintenance. Maintenance costs on these flywheel motors have been negligible. No repairs have been required. Bearings have not been lubricated since the motors were installed. The off-end bearing is factory lubricated and sealed and never requires lubrication. The other bearing is fitted for lubrication by the mill, interval recommended by the motor manufacturer being once every three years.

Reasoning Behind Flywheel. It is to assist the motor in meeting the instantaneous power demands of the loom that inclusion of a flywheel in the drive system proves desirable. During those periods when the loom asks little of the drive (for example: as the lay approaches the halfway mark in its rearward travel), the motor pours energy into the flywheel, there to store it until a peak load occurs. When the peak appears (such as the picking motion), the stored energy is available to supplement the efforts of the motor, thus easing the burden on the motor.

AT COVINGTON MILLS, in Covington, Ga., 14 of these flywheel motors are driving 46-inch Draper Model E looms making shade cloth. Gates V-belt loom drives are employed for the transmission of power to the crankshaft, instead of the pinion and gear arrangement utilized at Graniteville Co.

At this mill, also, it was possible to use a motor of ¾ hp rating, whereas it was necessary to use a 1 hp conventional motor for driving the same loom, previously.

Operating speed of the looms driven with the flywheel type motor was increased from 155 picks per minute to 164.

The motors at this plant are rated at 1200 rpm as compared with the 1750 rpm units at Graniteville.

Experience at Covington compares with that at Graniteville in that power factor is improved. The motors are equipped with wool packed sleeve bearings that require oiling once every six months.

The performance of the Gates V-belt drive has been highly satisfactory, also. Maintenance has been negligible as compared with pinion drives, according to the management. It has been the experience at this plant that 46 replacement pinions have to be made each year for the 41 looms equipped with pinion drive.

Case 2

15% Less Variation at Drawing

VARIATION in drawing was 33 to 35%, exclusive of card sliver variations, before a recent change at Adelaide Mills, Anniston, Ala. Variation has been reduced to 18% on 80 deliveries running with eight ends up on 1 1/32" Middling stock. Old drawing was operated at 137 feet per minute, and the same speed is maintained on the new drawing which was put in by Ideal Machine Shops. 10 breaker and 10 finisher deliveries have been in operation for approximately 10 months, and to date no maintenance has been necessary. Now the mill is 100% equipped with Ideal ball bearing drawing. 40 breakers and 40 finishers are run eight ends up respectively, making a total of 64 doublings through drawing.

55-grain sliver is entered at the breakers which produce 58-grain work, and finisher drawing makes 60-grain work from 58-grain stock. The new drawing was put in as a result of the excessive variation noted on the old frames. According to a spokesman at this mill, the new frames handle stock better, it runs cleaner with less variation, and there is less fly around the frames.

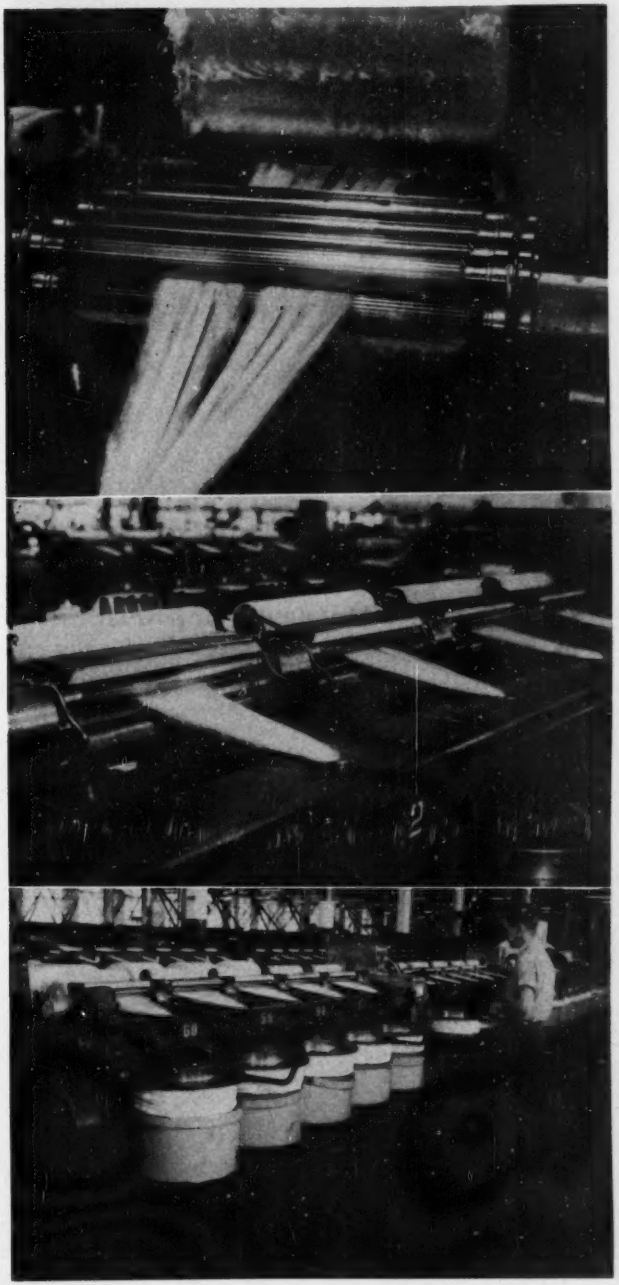
On many numbers it is possible to spin with this drawing from single roving and also to spin many different numbers from the same hank roving without any perceptible loss in quality or breaking strength. Also it is possible to run many different yarn numbers from the same hank roving, and in this instance this is a very important factor because Adelaide Mills is a sales yarn mill, and they do a great deal of frame changing throughout each week.

It was impossible under the old system to get the roving in the respective cans in the creels to run out at staggered intervals because of the necessity of changing roving so frequently; therefore the mill had to maintain a stand-by

BALL BEARING DRAWING ROLLS. Top photo, ball bearing drawing rolls reduced variation to 18% on 80 deliveries at Adelaide Mills. Center and bottom photos show portion of 165 deliveries in operation at another southern mill. Ball bearings and the special fluting and finish on the rolls are credited largely for satisfactory operation and good results.

crew to creel these frames when the roving started falling out.

In another southern mill, 35 drawing frames (four-roll) were converted by Ideal Machine Shops. 165 deliveries were reworked, and ten of these accommodate laps. The mill is experimenting with lap back frames in an effort to conserve space in this department.



Textile Industries Presents

SAVE LABOR
REDUCE WASTE
SIMPLIFY JOBS
IMPROVE QUALITY
INCREASE PRODUCTION

MODERN PRODUCTION METHODS

The converted drawing frames have been in service since March 1950, and the machines are doing good work. The fact that the outer race of two ball bearing units serves as the bearing for the roll received favorable comment from the standpoint of maintenance.

In this instance 1" and ⅞" stock is made into 65-grain sliver, and a spokesman for the mill indicated that ball bearings and the special fluting and finish on the rolls are credited largely for satisfactory operation and good results.

Two-process drawing requires a large amount of floor space for machines and cans, and the frames have to be run fast to get production through in this instance because there is presently an inadequate amount of available floor space.

Case 3

Knitted Fabrics Uniformly Dyed

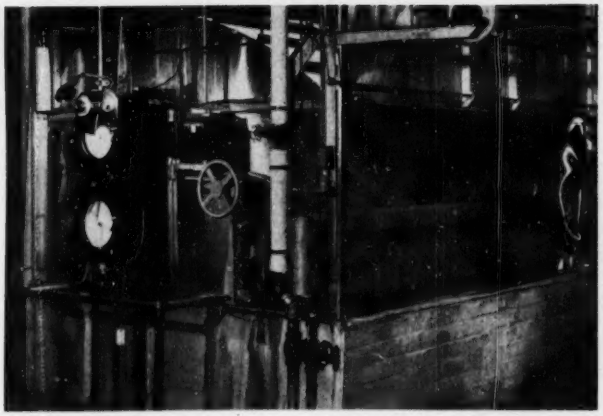
THE Taylor Fulflex Time Schedule Controller automatically controls temperature and time according to a predetermined schedule on dye kettles. In mills where these have been installed, operating costs on dye kettles have been substantially reduced.

At the Perry Knitting Company, Perry, New York, Fulflex controllers were installed on piece dye kettles, and G. M. Traber, president-treasurer of the company, made this statement: "Now we get

Textile Industries Presents

MODERN PRODUCTION METHODS

SAVE LABOR
REDUCE WASTE
SIMPLIFY JOBS
IMPROVE QUALITY
INCREASE PRODUCTION



COMPLETELY FLEXIBLE Time Schedule Controller on piece dye kettle at Perry (N. Y.) Knitting Co. In addition to producing more uniformly dyed fabrics, the instruments effect savings in operating costs.

level piece dyeing, thanks to Taylor control."

The Fulflex time schedule controller is a completely flexible instrument. All the operator has to do is load the kettle and push a start button on the instrument. From there on the controller regulates steam to the dye kettles, controls the rise, holds temperature and time according to a predetermined schedule. Precise dyeing temperatures are held during the entire cycle. Signal lights indicate various stages of the cycle.

Because of its flexibility, the use of this instrument on dye applications helps maintain uniform dyeing conditions, cuts operating costs, preserves the quality of dyed fabrics, and eliminates expensive errors due to manual control.

Case 4

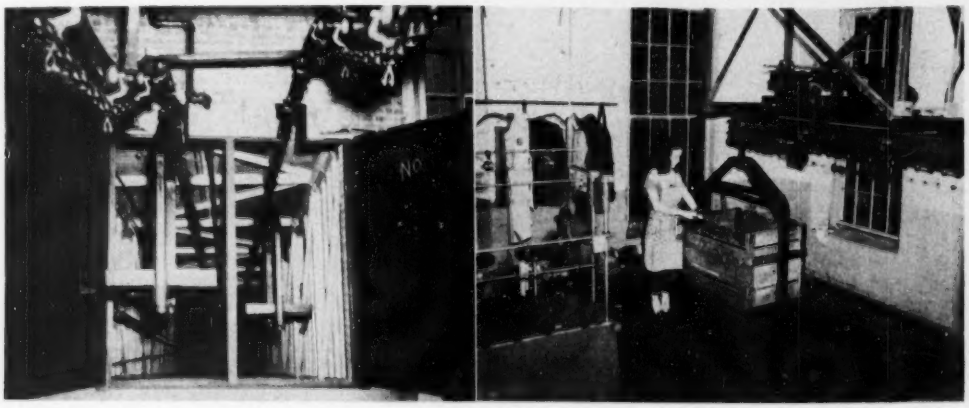
Overhead Conveyor Nullifies Distance Between Departments

THE LONG DISTANCE between spinning and winding rooms at the North Adams, Mass., plant of Strong, Hewat & Co., Inc., used to be considered a void that wasted labor and bottlenecked production—that is, until a continuous overhead conveyor was installed.

Eighteen pallets suspended from 500 feet of a monorail type of moving belt now transport a steady procession of boxes loaded with

CORRIDOR between spinning and winding room used to be busy with men pushing boxes through. Now, a continuous overhead conveyor performs the task mechanically.

CONVEYOR between spinning and winding room eliminated a considerable labor force engaged in nothing but handling operations. Here, winder operator handles box delivered by conveyor.



full bobbins from ring and mule frames or empty bobbins returning from winding. Jim Hewat, the mill's purchasing agent, describes the apparatus as "a great labor saving device."

A ½-hp motor drives the conveyor and may be run at a wide range of speeds. Stop stations are provided in an aisle near the spinning section and in the winding and steaming area. At these points, the conveyor brings the boxes to floor level where they may be discharged from the pallet. Floor guide rails at the stop stations keep pallets under control during handling. The system was supplied by Lamson Corp.

Case 5

Spinning Speeds Easily Changed with Adjustable Drive

AT CROWN Cotton Mills, Dalton, Ga., four Reeves Vari-Spin drives have been installed on an experimental basis on Model B, H & B (228 - spindle) spinning frames. The installations have been in operation for approximately five months, and the fact that fewer tapes come off on these frames is attributed to more uniform operation and gradual and even start-up of the drives.

Previously the mill was troubled with belts coming off on these frames. Now there is no belt slippage, and performance has improved, along with an increase in production. Management at this mill has not yet determined the amount of increase in production because the drives have not been in operation for sufficient time to make an accurate check.

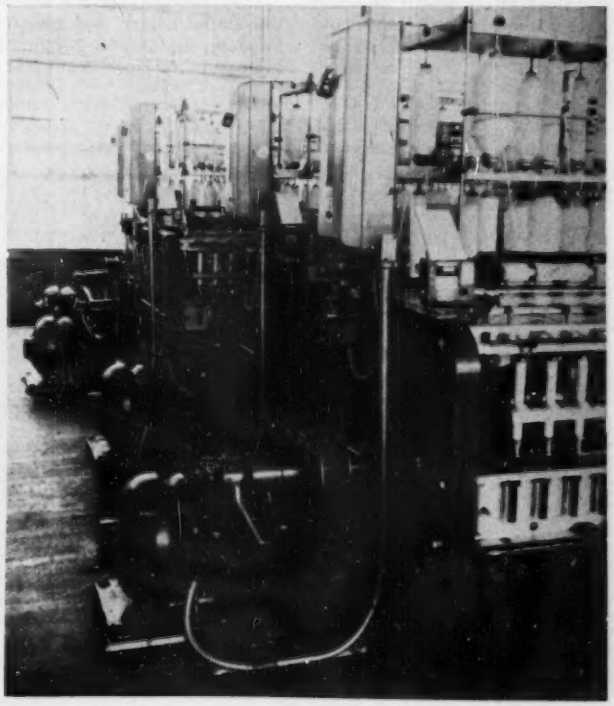
Yarn numbers are changed frequently at Crown, and the Vari-Spin drives have proved a major advantage in this respect. Now it is possible to change yarn numbers and speeds in approximately half the time formerly required, thereby saving labor.

On frames utilizing Vari-Spin drive it is no longer necessary to keep different size pulleys in stock for use when yarn numbers and speeds are changed. Formerly it was necessary to stock at least 2 or 3 extra pulleys for each frame. The new drives permit a more conservative stock of parts in inventory with a corresponding decrease in outlay of money for parts.

The work runs cleaner than it did on the same frames before the new drives were placed in operation in that no trash is flung into the stock and yarn being spun.

THE REEVES Vari-Spin drive has been tested in one of the largest cotton mills in South Carolina, and results show that the drive is most helpful and does a good job where a mill finds it necessary to change, with some frequency, the count being run on a spinning frame. The variable speed drive offers some advantages in consistently running yarn of one count in that slight changes in speed can help

CHANGING YARN NUMBERS on spinning frames equipped with Vari-Spin drives requires only half the time formerly consumed on the same frames before the drives were installed at Crown Cotton Mills.



achieve absolutely proper tension under changing running conditions, but the big advantages of the drive show up when a change is made in the count being spun.

According to the superintendent of spinning in the South Carolina mill, where it is necessary or convenient to run different counts on the same frame, one after the other, the Vari-Speed drive offers considerable savings. It takes only the turn of a wrench to change the drive to any desired speed within its 2.75:1 range. This takes only a few seconds in comparison with the 30 minutes to an hour which it takes to remove and replace change gears in the frame head when raising or lowering the speed of a frame driven by a single speed motor.

Case 6

Continuous Yarn Dyeing and Sizing Provides Many Benefits

A CONTINUOUS yarn dyeing, sizing, and beaming machine was installed at Woods Manufacturing Company Limited, Welland, Ontario, Canada, in September, 1949, and has been operating steadily on production since that time.

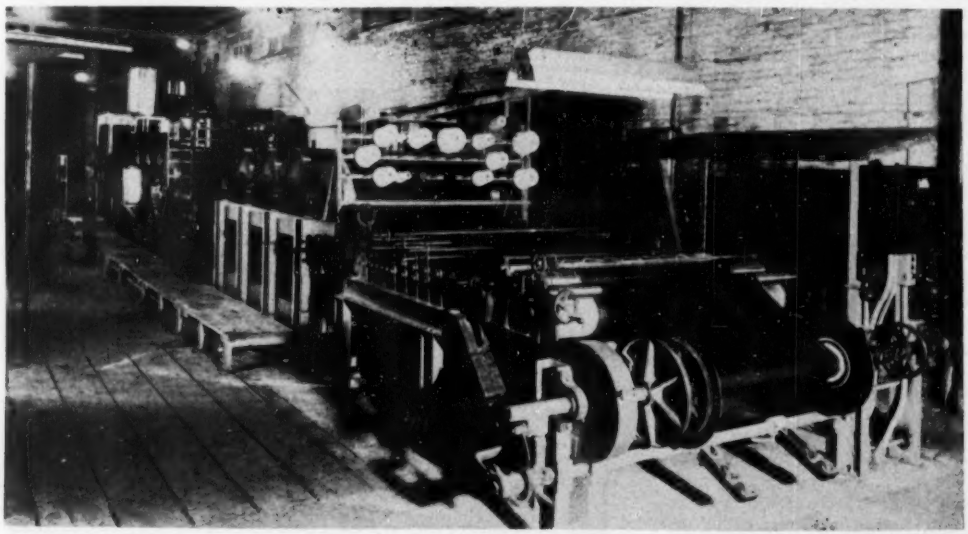
The machine, designated the Unistel-Batchelder and manufactured by the Unistel Textile Machine Corp. of Port Chester, N. Y., takes warp yarns direct from a set of section beams, dyes, treats, washes, dries, sizes, and winds the yarns directly onto a loom beam, ready for weaving, in one continuous operation.

Woods Manufacturing Company has about 600 looms and weaves various widths of cloth, requiring various yarn counts and a variety of dyes. The machine is operated with sets of from four section beams to seven of 32″ diameter and warp yarn counts from 9s to 10½s, employing black sulphur, blue sulphur, hydron blue, blue vat, and indigo dyes. Production requirements are easily met by operating one shift, five days a week, at operating speeds of from 25 to 45 ypm.

Before the installation by Unistel, Woods was limited to the application of sulphur dyes, had difficulty meeting production requirements, and produced many seconds due to uneven shades. There is now a reserve capacity of over four times its present production requirements to meet future expansion; any type of dye can be employed and even shades can be produced.

The machine was installed in an existing dye house in a space 110 feet long by 14 feet wide, including working space, and there was

It is estimated that this continuous yarn dyeing and sizing machine will pay for itself in only five years.



a maximum height requirement of only 8 feet.

Benefits derived due to quality are:

1. Complete dye penetration.
2. Uniform and even color shade.
3. Controlled precise yarn tension.
4. Excellent sizing due to uniform yarn dryness.
5. Few broken ends.

Benefits derived due to operation are:

1. One operation from section beams to loom beam.
2. Only two operating personnel from section beams to loom beams.
3. Wide operating capacity from 300 to 1500 pounds of yarn per hour.
4. Any type dye can be employed.
5. Any set of section beams can be used.
6. Any count yarns can be used.
7. Operating hp from 10 to 20 depending on speed.
8. Steam requirements approximately 2 pounds per pound of yarn.
9. Low maintenance.
10. Machine can be shut down or dye changed without dye waste.
11. The machine breaks no ends.

It has been estimated that the savings derived from these benefits will pay for the machine in five years, operating only forty hours per week.

Case 7

Compact Vacuum Stripping Unit Cuts Down-Time in Woolen Card Room

DESIGNED for portable stripping, a New England Machine Works vacuum unit was found to be of greater practicality in the card room of Berkshire Woolen Company, Pittsfield, Mass., when permanently emplaced. Despite the compactness of this machine, alleys were too narrow to take advantage of its mobile character. However, the stripper's 26-inch vacuum proved ample for stripping cards at some distance from the vacuum chamber.

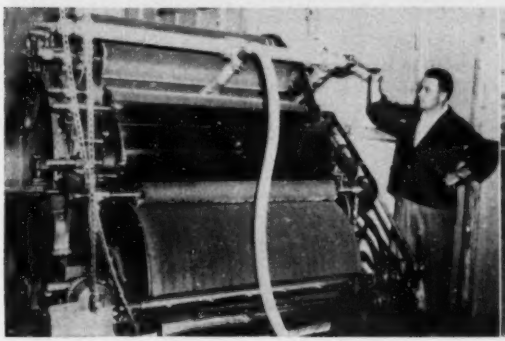
At this mill the casters of the self-contained stripper have been choked. A stationary duct leading from the machine has been erected in the card room with outlets between every two cards between the first and second breakers. An exhaust line from the vacuum chamber to a point outside the building was also added. Waste receptacle, 30 hp motor, vacuum chamber, and cooling system are integral on the trailer.

In the process of stripping, a flexible hose is brought out to the card on a cart where it is normally stored. One end is coupled to the duct outlet while the other end of the hose is attached to a portable traverse stripping nozzle carried to the card at the same time. The traverse attachment is fastened to brackets on the card frame.

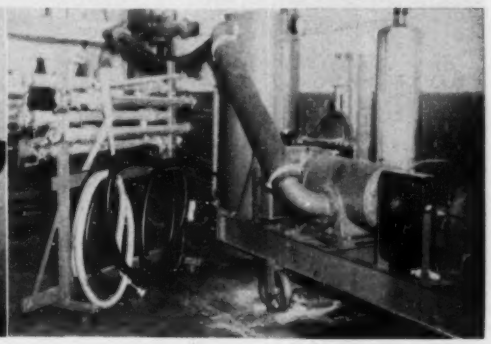
Currently, eleven 48/60 three-cylinder card sets are serviced by this method. All three cylinders, the second doffer, and the finisher doffer of tape condensers are stripped by hand-cranking the traverse mechanism. The first doffer, and the finisher doffer of ring condensers are still hand-stripped.

John M. Lacey, carding overseer, points out that two men can now strip a card in 1¼ hours, whereas it formerly required six men to do the job in the same time by hand stripping methods.

ALL THREE cylinders, the second doffer, and the finisher doffer of tape condensers are vacuum-stripped by hand-cranking the traverse mechanism.



FLEXIBLE HOSE is stored on portable cart (left). The vacuum unit in this mill has been temporarily immobilized, and outlets are located between cards.



Textile Industries Presents

MODERN PRODUCTION METHODS

SAVE LABOR
REDUCE WASTE
SIMPLIFY JOBS
IMPROVE QUALITY
INCREASE PRODUCTION

Case 8

Storage Facilities Conserve Space

PLANNED steel shelving and Rotabins are used to store small parts and weave room supplies in a small area in the weave room at Athens Manufacturing Company, Athens, Ga. The storage facilities were made by the Frick-Gallagher Manufacturing Co., and such parts as pick cams, parallel shoes, pick cam hubs, and similar items are stored on the shelves in conveniently arranged compartments. Battery parts, nuts, bolts, screws, and feeler motion parts are kept segregated and easily accessible in the steel Rotabins.

The small parts room is convenient for fixers to quickly obtain repair parts from the second hand or overseer who issues items as they are needed.

Parts most frequently used are kept in the small store room, and the Rotabins and steel shelving help keep parts stored and segregated in the least possible space. In addition to conserving space, the planned storage facilities save considerable time when parts are needed quickly. There is no wasted space in this planned storage area. One big advantage of the steel shelving is versatility, wherein the compartments and sections can be rearranged in accordance with current needs by simply altering the location of the removable partitions.

Heavier parts which are used less frequently are kept in the main supply room; these parts include such items as lays, lay swords, and crankshafts.

COMPACT small parts storage room at Athens Manufacturing Co. Note movable partitions on steel shelving and space-saving Rotabins.

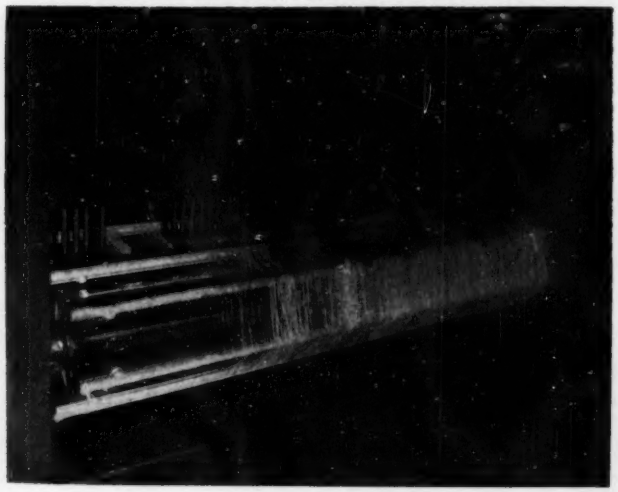
Case 9

Quill Stripping Operation Improves Through Use of Denser Brushes

QUILL STRIPPER brushes are being replaced in many mills with the Fullergript strips, a product of the Industrial Division of The Fuller Brush Company. These strips, according to the manufacturer, offer a continuously dense brush face which, combined with a stiffer trim that does not bend over or mat, results in more efficient cleaning, less stoppage, and longer life.

Worn out, old style brushes are removed and five 3/8" holes are drilled through the bottom of the channel. The special clamps furnished with the brush strip are placed on the strip and matched to the holes in the channel. The shank of each clamp is inserted

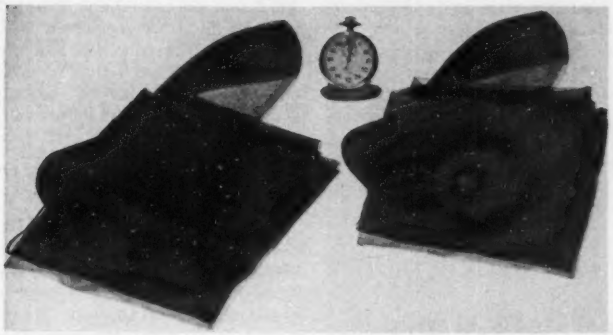
Quill stripper fitted with Fullergript brushes described here.



and the washer and nut applied.

One mill has reported 20% increased stripping efficiency with a more uniform action with elimination of "vacant" brush sections through the use of the strips.

Case 10



THE DROP OF WATER on the untreated stocking at the left has not been absorbed at all in three minutes. The area of the wet spot on the Nylonized stocking at the right indicates instant absorption.

Specially Treated Nylon Hosiery Absorbs Water More Rapidly

TESTS on goods manufactured at Wytheville Knitting Mills, Wytheville, Va., show that nylon hose treated with a "Nylonized" finish absorb and disperse water immediately. Treated garments are more comfortable to wear in all kinds of weather, and they possess a softness, pliability, and warmth not found in untreated nylon.

Additional tests showed that the snag, flexing, and abrasion ratings of the Nylonized stockings were excellent and comparable to harsher resin finishes. The bursting strength was found to be comparable to other tests using the same type of fabrics with other finishes.

Tests made by Foster D. Snell, Inc., showed that the color of untreated stockings after ten washings was noticeably lighter in shade and varied from stocking to stocking. The Nylonized stocking showed only very slight change in color and only slight variation among stockings.

The water diffusion test consisted of placing a measured drop of water on the stocking which was held in place by an embroidery hoop. Seven thicknesses of the stocking, including the welt, were used. The time the drop entered the stocking, the time for the drop to diffuse, and the diameter of the water mark at the time of diffusion and after 15 minutes were recorded. Four readings were taken and the average time reported for a drop of water to diffuse on the treated fabric was 15 seconds; whereas the untreated fabric did not appreciably absorb the water in nine minutes.

The Nylonizing process was developed by Hans C. Bick, Inc., and

Stockings are Nylonized in this machine at Hans C. Bick, Inc. The finish is bonded to the nylon stockings with the aid of heat and citric acid and does not wash off or wear out.

SAVE LABOR
REDUCE WASTE
SIMPLIFY JOBS
IMPROVE QUALITY
INCREASE PRODUCTION

consists of putting about 2¾ per cent (by weight) of emulsified Type 8 nylon on nylon fabrics to improve the moisture-absorbency and hand of the fabrics. The finish is permanent for the life of the garment and is applied in standard equipment for dyeing. It is applied after dyeing and is bonded to the material in a curing part of the process. In applying the finish to nylon stockings, it is put on after dyeing and is set by the temperature of the bath and in the final boarding operation.

Stocking may be Nylonized by adding 20% Nylonize on the weight of 30-denier goods and 25% on 15-denier goods. 1% citric acid on the weight of the Nylonize is added to the bath to help bond the finish to the nylon. Before the finish is added to the bath, the Nylonize is dissolved in equal parts of alcohol. The Nylonize and alcohol solution is strained through a piece of cloth as it is added to the rotating dyeing machine. After the machine has operated for five minutes, the temperature is raised to 95 F and the citric acid is added. The temperature is then raised to 105 F and the machine is operated until the bath becomes clear.

Hans C. Bick, Inc. will sell the Type 8 emulsified nylon to anyone who wants it, but certain standards must be met before fabric manufacturers may call their fabrics "Nylonized."

Case 11

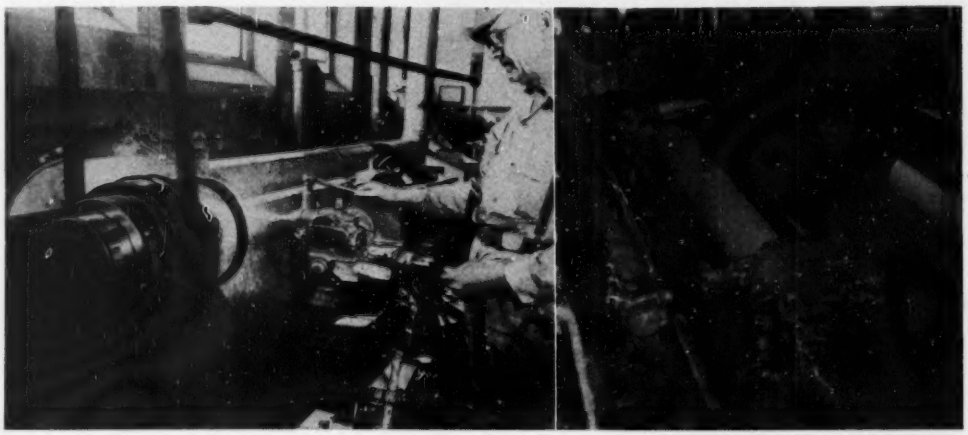
Use of Metallized Sand Rolls Reduces Weave Room Supply Costs

ONE HUNDRED SEVENTY-FIVE out of 300 Draper Model E looms in operation at Muscogee Manufacturing Company have been equipped with metallized sand rolls in an effort to reduce parts costs, maintenance, and to improve operation of the roll. Plans call for finishing all sand rolls on all looms, including C&K, with the metallized finish.

According to management at this plant, the metallized finish holds cloth better; moreover expensive repairs are no longer necessary on the sand rolls. Formerly it was necessary to pay skilled repairmen a high hourly rate to maintain the sand rolls.

The metallizing operation is performed in the mill machine shop, and the machine is gauged to put on a uniform amount of grit as the lathe turns the roll. The Metallizing Engineering Company supplied the machine and recommended the correct metal to obtain the desired grit on the rolls. Only metal sand rolls have been metallized to date, and the finish usually lasts indefinitely. The finish has come off of two rolls because they were not cleaned properly before metallizing. Although quality should be improved through use of the metallized sand rolls, no substantiating data are available at this time. Other types of sand rolls used by this mill

Left, sand rolls are metallized in the mill shop on a lathe at a cost of five cents per lineal inch. Right, roll has new appearance after several months service on loom.

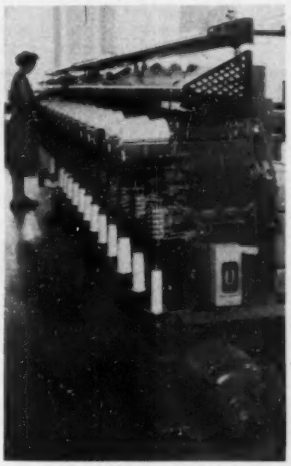


Case 12

Packages Made on New Winders Have More Customer Appeal

NEW Foster Model 77 winders are making large packages which customers are pleased with, according to experience at Crown Cotton Mills, Dalton, Ga. The new machines wind up to ten pounds of yarn (see accompanying photo) on each package; whereas this mill was formerly winding only two pounds on each package.

Several Model 77 winders were installed, and immediate and favorable customer reaction was received upon shipment of the first batch of the large packages. 48 deliveries are now in production on 8s/2 yarns, and management at this mill is pleased with the improved build, neat appearance, large package, and customer acceptance of the new package.



Package size was increased from two pounds to ten pounds by using Foster Model 77 winders at Crown.

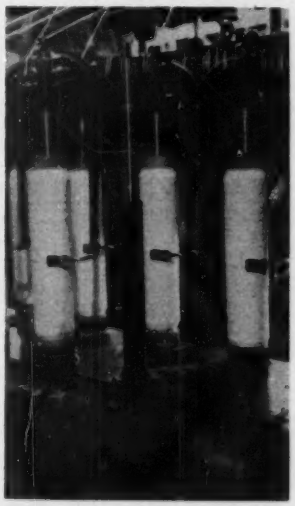
Case 13

Reconditioned Spindles and Flyers Save Money

WORN fly frame spindles are metallized and machined for further use on equipment in operation at Grantville Mills, Grantville, Ga. The reconditioning job is done by Ideal Machine Shops, Bessemer City, N. C. Worn pressers are built up and an RKO antirust finish is applied to flyers, which are carefully balanced before being returned to service.

Some spindles and flyers at

NOTE NEW appearance of reconditioned spindle and smooth antirust finish on flyers in operation at Grantville Mills.



have had broken sections or otherwise damaged gripping surfaces which may cause slack selvages or otherwise lower quality of the cloth.

Metcoloy No. 2 (stainless steel) ⅛" wire is used in a Metco Y gun equipped with Size C air cap. Although metal rolls are the only type finished at this time, plans are in progress to metallize wood sand rolls. A coating of zinc is necessary on the wood before the metal will stick properly, and the zinc oxide fumes are toxic. The problem at present is to provide adequate ventilation in the machine shop to remove the zinc oxide fumes.

A Type X shaft preparation tool is used to prepare the metal rolls to receive the metallized finish. The rolls must be cleaned thoroughly, and the knurl impression sufficient to supply a good anchor for the finish. Wood pegs in the rolls affect the operation of the shaft preparation tool adversely and should be accounted for in the process.

Sand rolls are given an undercoat of Sprasteel No. 80 carbon steel before applying the chrome carbon stainless steel finish coat. Some desirable features of the metallized rolls include:

Long service life;

Stainless surface prevents rust on cloth;

Uniform take-up helps produce uniform weave;

Approximate first cost is equivalent to other sand rolls.

Many mills are using metallized sand rolls, and in some instances costs have been reduced by sand blasting the metal rolls to prepare the surface for metallizing; this is in lieu of using the shaft preparation tool. Finished rolls have a quality of hardness equal to Rockwell C-65. The time required to sand blast a roll varies from two to four minutes, and the cost of metallizing rolls at Muscogee is approximately five cents per lineal inch.

Grantville have been in operation for seven years since they were reconditioned by Ideal Machine Shops, and this mill is very well satisfied with the results obtained.

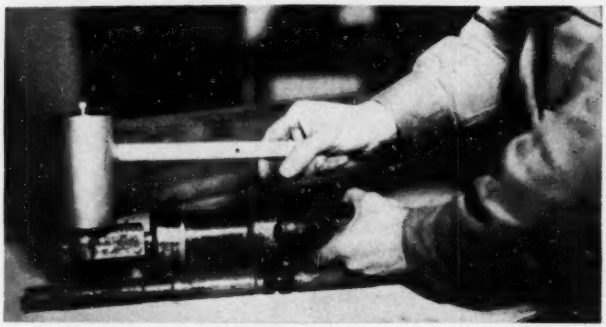
The refinished and reconditioned parts save approximately one half the cost of new parts. The Ideal flyers and spindles prevent stretched roving and help improve and maintain quality work. Emphasis is placed on obtaining good quality work in this plant. A five per cent increase in production has been noted on reworked flyers and spindles, and thick and thin places have been eliminated in roving and yarn.

Although quality is the prime consideration at this mill, the reconditioned flyers and spindles pay for themselves in terms of increased production on a five-year basis. Grantville Mills make 6s to 20s dyed knitting yarns.

Some rayon and wool blends are processed, and the finish on the flyers helps maintain quality, especially on rayon, because the staple has a decided tendency to cling to rust spots on flyers. High humidity in the mill is conducive to rust on bare metal parts, but the anti-rust finish has proved effective in preventing rust on flyers.

OLD FLYER has worn presser, and finish has rusted. Right, note worn condition of spindle top before reconditioning job is done.

Case 14



BASICALLY a small hydraulic jack, the roll separator does not injure steel drawing rolls in separating them.

Hydraulic Divider for Drawing Rolls Lessens Down-Time for Repairs

TWENTY mills in the Gastonia, N. C., area are now using a hydraulic roll separator to pull steel drawing rolls apart when they need refinishing or repairs. The machine has been in use at the Flint Plants longer than any others, and D. Gunter, superintendent of Flint No. 1, says that it is saving them about half the time formerly required to pull rolls. He feels that the machine is doing an excellent job and that it avoids any injury to the rolls in separating them.

The machine is basically a small hydraulic jack that has a V-head designed to fit on the shafts of various size rolls between the fluted sections. When a lever is pumped, the jack opens and separates the sections of the rolls with a minimum of effort. Since the force is applied in a straight line, no damage is done to the rolls.

The hydraulic separator is an invention of two Gastonia men, G. G. Simmons and Ray Smith. It is being distributed through the B. & S. Machine Shop, Gastonia, N. C.

Case 15

Dye Kettle Cleaning Costs Decreased

TO CLEAN dye kettles in preparation for changing the dye liquor from black to red or vice versa, cost a New England cotton mill approximately $25.00 until a new method was utilized. The vats were cleaned with caustic and hydrosulfite.

Now Oakite Penetrant (prepared at 4 ounces per gallon of waste) is applied with the Oakite No. 481 Solution Lifting Steam Gun. Cleaning cost has been reduced to $5.00.

Case 16

Yarn Handling Unit for Spooler Reduces Operating Costs

Textile Industries Presents

SAVE LABOR
REDUCE WASTE
SIMPLIFY JOBS
IMPROVE QUALITY
INCREASE PRODUCTION

MODERN PRODUCTION METHODS

Now only one operator is required for each Barber-Colman automatic spooler instead of two formerly needed.

A METAL SLAT conveyor, manufactured by Whiting Products Co., is proving to be a money saver at Joanna (S. C.) Cotton Mills Co. The conveyor is in use on their Barber-Colman spoolers, and it has made it possible for one operator (rather than two) to handle the laying-up of yarn on each spooler.

The installation consists of a motor driven conveyor made up of a series of half-moon shaped metal slats. This shape makes it possible for the conveyor to make a continuous loop around the spooler. In addition, there is at one end of the spooler a hydraulic lift which will pick up a bobbin truck and tilt it so that the bobbins of yarn will dump onto the conveyor. This same lift is arranged so that empty bobbins returned from the spooler may be easily emptied into a bobbin truck after a sufficient number of them have collected in the spooler empty bobbin hopper.

Operation of this equipment is simple. Bobbins of yarn are brought from the spinning room to the spoolers in standard bobbin trucks. The trucks are placed in position to be picked up in the hydraulic lift, and the lift is actuated. The bobbin truck is lifted and tilted so the bobbins fall out onto the metal conveyor. During this dumping period the con-

METAL SLAT CONVEYOR for yarn can be seen in the foreground of this general view (top) of one of Joanna's Barber-Colman spoolers. Center: Operator has just dumped a truck of full bobbins onto the conveyor. Bottom: Empty bobbins are collected in this hopper which is filled when in position under spooler. Hydraulic lift pulls hopper out, raises it, and dumps bobbins into truck for delivery to spinning room.

Textile Industries Presents

MODERN PRODUCTION METHODS

SAVE LABOR
REDUCE WASTE
SIMPLIFY JOBS
IMPROVE QUALITY
INCREASE PRODUCTION

veyor is moved along as the operator desires, and bobbins are uniformly distributed as the conveyor moves.

In this way, the spooler operator has always before her on the conveyor a supply of bobbins of yarn to use in feeding the spooler. The conveyor moves only when bobbins are being dumped onto it from the bobbin trucks, but by timing this dumping properly, the conveyor can be kept evenly full, and laying-up becomes merely a matter of the spooler operator reaching down and picking up a full bobbin from the conveyor and putting it into the spooler.

Empty bobbins are carried back to the end of the spooler on a small belt conveyor which dumps them into a hopper. Whenever this hopper becomes full of bobbins, an empty bobbin truck is placed in the hydraulic lift, and the empty bobbins are mechanically dumped from the hopper into the truck.

Joanna has been using this yarn handling unit on its spoolers for about a year, and through it has been able to handle laying-up at the spoolers with one operator for each spooler instead of two.

Case 17

Moisture Controls on Tenter Frames Increase Production 25%

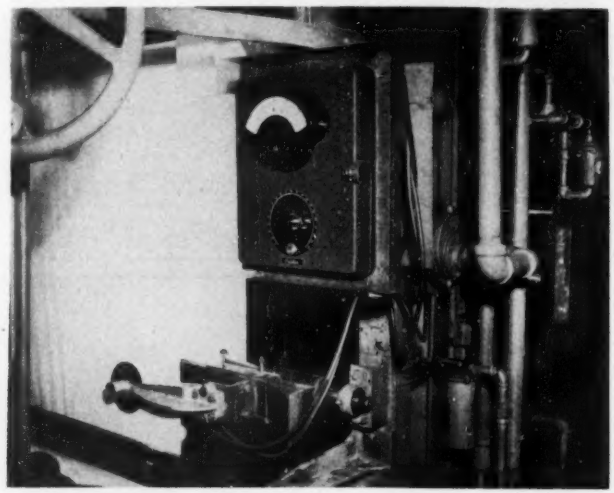
A WELL KNOWN dyer recently installed five Fielden Drimeters to measure and control moisture content during tentering. The benefits obtained were many: output was increased 25% to 30%; thirty-two machine hours a day have been saved; steam consumption has been reduced 20,000 pounds a day which, at 60¢ a thousand pounds, means a daily saving of $12.

Together these two savings amount to $472 a week—$23,600 a year. (The cost of the equipment was approximately $4,000.) In addition, a better finish, a better hand, and uniform width are assured, and there are no variations in the finish

The Drimeter indicates on a meter the exact moisture content of the cloth being dried. Cotton, viscose or acetate rayon, nylon, or woolen fabrics are all handled equally accurately. The equipment is mounted so that it is convenient for the operator to see the meter clearly. All need for manual testing is removed. The operator can control the speed of the machine to deliver goods at just the correct moisture content, thus eliminating all chance of overdrying.

Automatic control can be applied, and the percentage of moisture to be retained can be set in the control. The fabric will be delivered at this moisture content despite variations of steam pressure, pre-extraction, or any other cause.

Close-up photo of tenter frame, showing the "Drimeter" control.



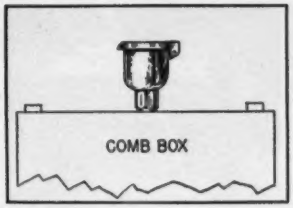
Case 18

Spring Top Oilers Simplify Comb Box Lubrication

A TRIAL installation of spring top Gits oilers was made on comb boxes in an eastern Tennessee cotton mill. These proved so satisfactory in that they made oiling easier and quicker that operatives requested they be placed on all comb boxes on all of the cards in this plant.

The suggestion was carried out. Now adding lubricant to the comb boxes is a simple operation.

The mill installed the handy oilers by moving a portable drill



COMB BOXES at an eastern Tennessee cotton mill are fitted with Gits oilers as indicated in this sketch.

press around the card room, using a ¼-in. drill, and tapping to install. Only a short time is required to do this work.

With these oilers, the spring top is simply lifted and the oil added. No oil is spread about the card room, and it is no longer necessary to unscrew a plug to add lubricant to the boxes.

The mill has had the oil funnels painted a bright yellow for easy and quick identification.

Textile Industries Presents

SAVE LABOR
REDUCE WASTE
SIMPLIFY JOBS
IMPROVE QUALITY
INCREASE PRODUCTION

MODERN PRODUCTION METHODS

Case 19

Accurate Cloth Measurement Saves Mill $16,000 Annually

AN ACCOUNTANT in one mill discovered that less cloth was shipped from the mill than the amount of yarn used should be producing. All production machines were subjected to extensive checking. The cloth measuring machines were the last machines to be checked. These machines, which everyone in the mill had assumed were accurate, were measuring 24″ of cloth for every 24⅛″ which passed through the machines. The yardage going to customers was one yard and 3/16

Case 20

Clock Spring Top Motion Features Long Spring Life

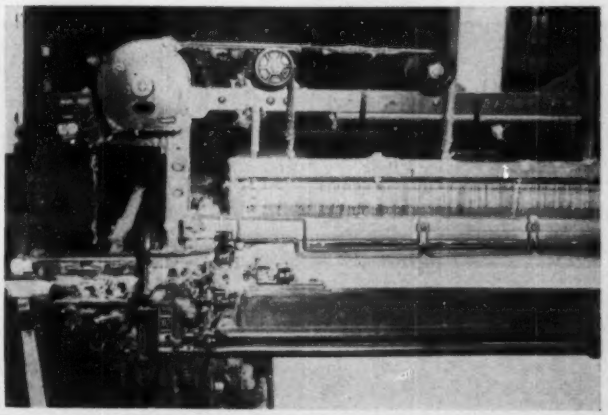
MORE UNIFORM pull is exerted on the harnesses of those looms fitted with the new clock spring type top motion developed by Draper Corporation. This has been the experience of a Georgia cotton mill superintendent who has for over a year observed the operation of 53 Draper 60-inch Model X-2 looms so equipped.

Benefits derived from the more uniform pull include: (1) less strain on the harnesses, (2) less breakage of harness hooks, and (3) less strain on harness straps.

As can be seen by examining the accompanying photo, which was made in the above mentioned mill, the clock spring mechanism is of streamlined design, with the springs themselves being totally enclosed. Therefore, the appearance of that portion of the weave room in which these looms are located is considerably improved over that portion in which other types of spring tops are used.

IN A SOUTH CAROLINA cotton mill where a large number of Draper 44-inch Model X-2 looms are also equipped with this new top motion, the weave room overseer cited two other advantages: the life of the new clock springs is more than twice that of the old type springs; tension on the springs is easily adjustable.

This top motion can be installed on existing looms and specified for delivery on new looms.



Textile Industries Presents

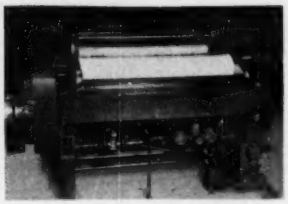
MODERN PRODUCTION METHODS

SAVE LABOR
REDUCE WASTE
SIMPLIFY JOBS
IMPROVE QUALITY
INCREASE PRODUCTION

inches for every yard invoiced.

The normal weekly output of the mill was 150,000 yards of cloth, which meant that every week 781 yards of goods, worth $312.50 at the prevailing price of 40¢ per yard, were going to customers free. The mill was actually losing $16,250 every year, in undermeasured cloth.

Hermas measuring and examining machines were installed to stop the loss because accurate measurement is guaranteed to within ⅛ of one yard, on any piece of goods, regardless of the length of the piece.



PNEUMATIC cylinder and valve arrangement underneath the picker may be clearly seen in this retouched photo.

Case 21

Pneumatic Rack Control for Pickers Maintains Uniform Tension on Lap

A PNEUMATIC rack control is now being used on one of the pickers at Joanna (S. C.) Cotton Mills Co. It replaces the old friction pulley tension system for the lap rack. The device also eliminates the use of a hand wheel for raising and lowering the logger head on doffing and start-up.

Operation of the device is completely automatic. As soon as the lap is full and the full-lap knock-off motion operates, the lap rack is quickly and automatically raised so that the lap pin may be removed in the regular way and the full lap taken from the machine and to the scales. Then, when the pin is replaced and the operator steps on the foot pedal to start the machine, the lap rack automatically descends to its empty lap position and proper tension is held throughout the building of the lap.

Although this device does save some time for the operator, its most important action is the instantaneous application of proper pressure to the starting lap. This means that the whole lap is usable in the card, and there is no need to tear off the last yard or two in order to avoid feeding unevenly.

While Joanna had the pneumatic device on only one picker at the time this information was obtained, units were on hand to change over all pickers. The mill is pleased with performance of the device, and feels that it is paying for itself. Both the operator and the overseer say that it is a welcome addition to the picker room.

The device is manufactured by Saco-Lowell Shops.

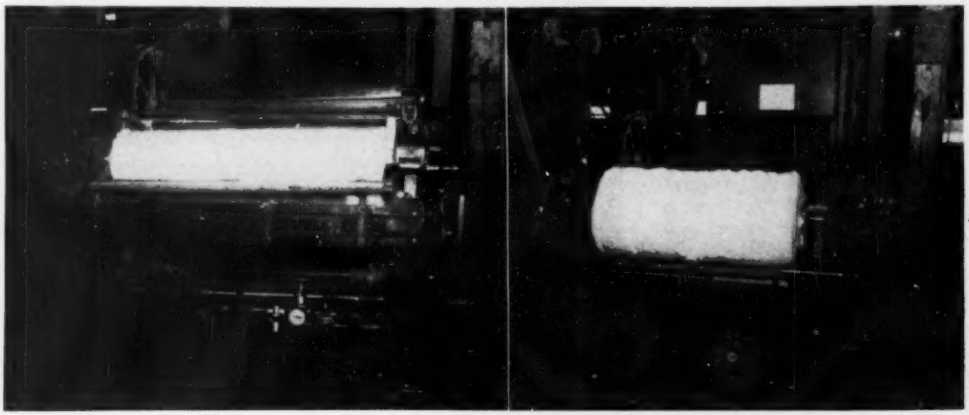
GOOD RESULTS are also being obtained with this device in an Alabama cotton mill.

Here it has been found that the pneumatic rack control removes some of the stress or load from the picker, and consequently it is believed that it contributes to reduced logger head breakage.

The control makes possible the maintenance of a constant yard-to-yard tension in the lap from the

UNIFORM PRESSURE ON LOGGER HEADS is maintained throughout the winding of the lap.

WHEN LAP IS FULL and picker knocks off, logger head is automatically raised to permit removal of lap pin.



first to the last yard. It cuts the doffer's working time, requires less cleaning, and minimizes picker downtime.

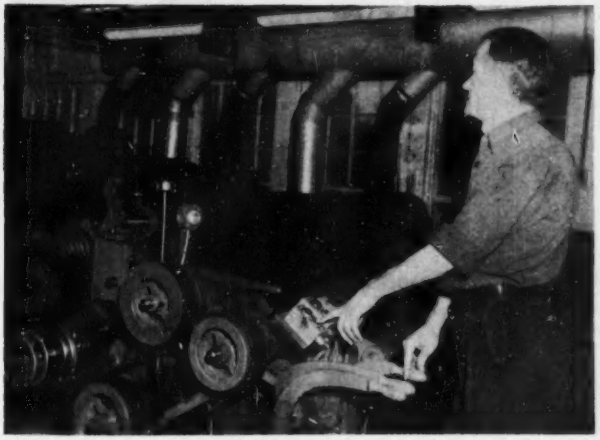
Since the control was installed at this mill, the weight of the 40-inch laps has been increased from 43 pounds to 54 pounds net with an increase in diameter of only 1 inch—from 18½ to 19½ inches.

Textile Industries Presents

SAVE LABOR
REDUCE WASTE
SIMPLIFY JOBS
IMPROVE QUALITY
INCREASE PRODUCTION

MODERN PRODUCTION METHODS

Case 22



SHEARS AND CLOTH can be controlled at one point on the three-blade automatic shearer at Charlton Woolen Co.

Wool Cloth Shearer Does Job of Three

A THREE-BLADED shearing machine that processes back and face in one continuous operation has replaced three older machines at Charlton Woolen Co., Charlton City, Mass. The machine, a Davidson manufactured by Parks & Woolson Machine Company, has permitted this cloaking firm to move four operatives to other work.

Maintenance is greatly simplified on the new model. One man can lift a blade for honing and complete the job in two minutes. Five minutes from shear stop to shear start is possible. First, the blade is thrown back away from the shearing position. Then, the revolver is slid out of contact with the ledger knife by means of a lever. Fly blade box caps, fly blade axial vibrator, and swab are all pivoted and may be instantly swung out of operative position during honing. The hone is finally run at correct angle across the face several times.

A seam detection device is incorporated on the Davidson. Main element of this feature is a GE vacuum tube relay which is readily adjustable for lift and lower periods. The control can be set sufficiently fine to provide for clean and uniform finish within 1½ inches of each side of the cloth ends at high production speeds. As a result, there is considerable cloth saved.

Blades and brushes are vacuum cleaned and a flock disposal system is integral. Raising, laying, and flock brush to each blade have a combined one-motor drive. At Charlton, brushes and cloth feed are operated independently. Bearings throughout are ball or roller.

Case 23

Self-Cleaning Roving Box Also Safe

SAFETY was the main objective in the minds of W. F. Lee and Dewey Stephens of Glendale Mills, Spartanburg, S. C., when they developed a new roving box. In addition to safety, the box has other features: it is self-cleaning, the roving rolls to the lower end, and a person of low stature does not have to strain himself in order to reach in and pick up the bobbins.

Most operatives who are low in stature are in the habit of reaching over and hanging their abdomens on the top edges of the roving box, and for this reason the inventors developed a panel at the lower end of the box that can be pushed down against the tension of a light spring. The panel has a covering of velvet

Safety roving box has self-cleaning feature.

cloth on top to provide a soft pressure on the abdomen. This panel can be pushed down for a distance of six inches, but this distance can be altered when boxes are being built.

The bottom of the box slopes at an angle which causes the roving to roll to the end so that the employee can reach the stock without too much strain. This enables him to lay up more roving in less time.

Six grill bars are a part of the bottom of the box and provide a self-cleaning feature. These bars are on the end next to the panel and at the bottom of the incline. This construction allows trash to slide downward and through the grill.

Case 24

Sealed Floors Promote Cleanliness

ONE APPLICATION of floor finishing material each year serves to keep floors clean and in excellent condition at the Central and Catherine plants of Avondale Mills in Sylacauga, Ala. One man now does all floor finishing, and the floors are easy to keep clean and spotless. Formerly a crew of three men scrubbed floors once each month. A V-mop is now used to keep the floors free from lint accumulations. Lint does not stick to the floor finish, and rubber or metal wheels on trucks do not mar or crack the finish.

The present system of floor maintenance is less expensive than other methods which were tried at these plants. Important results achieved through good floor maintenance in this instance are: savings on maintenance; good housekeeping; pride and good morale among employees; and favorable impression on visitors.

The floors in these plants were sanded three years ago, and a G. H. Tennant floor sanding machine was used for the initial preparation. After the first application of floor sealing material, the floors are gone over once each year with a single coat of floor sealer. The

Sealed floors cut maintenance costs, promote good housekeeping, and boost employee morale.

Case 25

Selvage Trimmer Saves Time

THE Moss Rose Manufacturing Co., Philadelphia, Pa., installed piece goods Trim-Master equipment on a Hermas inspection machine, and plans have been made to extend its use to other inspection machines in the plant. This mill found Trim-Master to be a tremendous time saver in that upholstery fabrics can be selvage-trimmed in three minutes, whereas by the old hand scissor method up to 45 minutes were required to trim a single 90-yard piece of goods. Made by the Ginsberg Machine Co., Inc., the Trim-Master produces a uniformly trimmed fabric of good quality. The equipment is expected to pay for itself at least three times in the first year of operation.

procedure is to use a degreasing agent, which is sprayed on the floor, and after the degreaser is mopped up, the floor sealer is applied. After the first machine finish, the floors are not sanded before refinishing unless some heavily traveled area becomes worn or rough.

Cost figures indicate 6.7¢ per sq ft initial expense for doing an unfinished area; however, the cost of maintaining the floor after it has once been finished is negligible. No cost figures are kept for floor maintenance in these plants. Floor finishing materials supplied by DuPont, Selig, and West Disinfecting Company have been used with good results.

Textile Industries Presents

SAVE LABOR
REDUCE WASTE
SIMPLIFY JOBS
IMPROVE QUALITY
INCREASE PRODUCTION

MODERN PRODUCTION METHODS

Case 26

Rayon Quiller Attachment Loads Bobbins Directly onto Pinboards

AT TEXTRON Southern's modern Hartwell, Ga., filament rayon weaving plant a substantial saving in labor costs is being realized through the use of Abbott automatic pinboard attachments on the three 120-spindle Abbott automatic rayon quillers that wind the filling for 600 Draper XD and Crompton & Knowles S-6 looms.

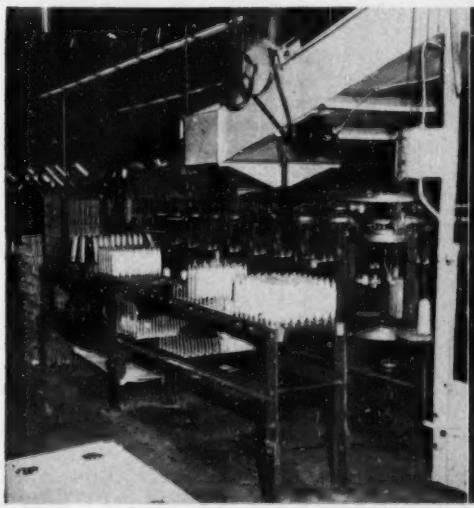
Full bobbins or quills are automatically placed onto pinboards, eliminating the necessity for hand-loading them. As a result, one operative can easily tend one of the 120-spindle quillers which at the present time are each producing approximately 1200 full bobbins of 100-150 denier filament rayon per hour (20 per minute). Bobbins are 7⅜" long.

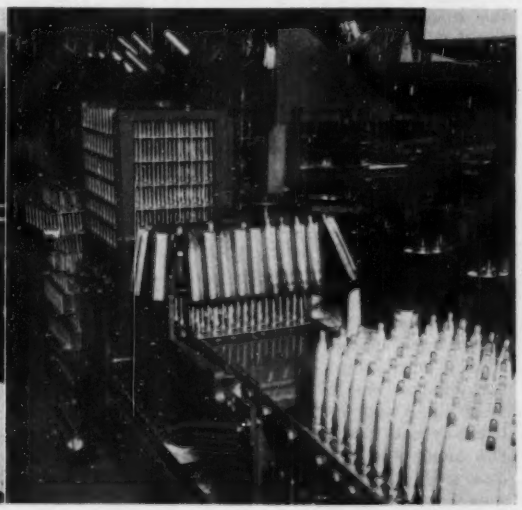
The operative's duties consist of starting and stopping the machine, replacing packages and threading them up, and occasionally piecing up a broken end.

The pinboard attachment magazine holds six empty aluminum pinboards that will accommodate 96 full bobbins of yarn. As each empty pinboard passes the loading mechanism, eight bobbins are loaded simultaneously until the pinboard is filled and carried along onto the pinboard conveyor, ready for conditioning and transfer to the weave room.

In addition to savings in labor, other advantages are derived with the attachments: (1) Filling can be quickly and easily inspected on the pinboards, and (2) there are no soiled or dirty bobbins at the quilling process.

THE PINBOARD MAGAZINE, LOADING MECHANISM, and conveyor can be seen in the full-view photograph (left) of one of the Abbott automatic pinboard attachments in operation at the modern Textron Southern filament rayon weaving plant at Hartwell, Ga. Magazine holds six empty pinboards. Note supply of pinboards stacked on floor behind magazine. A close-up view of the loading mechanism is presented in the photo on the right. Full bobbins of yarn from individual traveling spindle units are gently deposited into one of the loading chutes which traverse and act as continuous bobbin feeders for the pinboards.





Textile Industries Presents

MODERN PRODUCTION METHODS

SAVE LABOR
REDUCE WASTE
SIMPLIFY JOBS
IMPROVE QUALITY
INCREASE PRODUCTION

Case 27

Color-Eye Aids Dyers

Dyehouse application of Color-Eye instrument assists in matching colors and proves to customers that the match is correct.

SEVERAL dyers in the Piedmont textile region have been using Instrument Development Laboratories' Color-Eye instrument for color comparison and matching of dyed fabrics and dyes. By placing a sample of the desired color in the instrument and placing beside it the sample to be matched, the Color-Eye will show, in scales of the primary colors, just how far off the sample is from the standard.

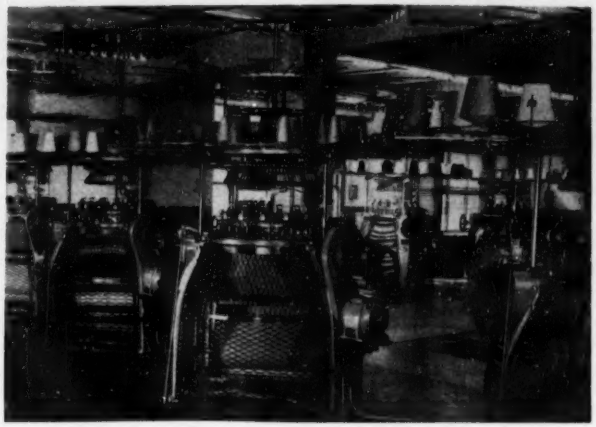
Virginia Dyeing Corp., Emporia, Va., has had particularly good results in the use of the instrument. They do continuous jig dyeing of various types of fabrics, and they have found the Color-Eye to be of considerable assistance, not only in matching, but in proving to their customers that the match is correct.

In jig dyeing it is possible to make changes in the dye bath while the goods are being dyed, and it is the practice at Virginia Dyeing Corp. to sample the material for color while it is still in the jig. A sample of the material being dyed is placed in the Color-Eye along side the sample to be matched, and the instrument shows just how close the colors are. If the bath is not correct, it can be changed by the addition of the proper dye until the samples do correspond.

Records are kept of the Color-Eye tests on the finished cloth, and these prove to both the dyers and the customers that the desired color was achieved. Virginia Dyeing Corp. feels that the Color-Eye is a real help as a measuring instrument and a production tool, both management and dyers using it for these purposes. A second instrument has been purchased for use in the New York sales office, where it serves to prove proper matching to customers.

Batch dyers, on the other hand, have not found such wide use for the machine, for with the batch system, there is no way to change

Case 28



30% More Production Obtained with Improved Body Knit Machines

STONE KENT Products Corporation, Bronx, N. Y., manufacturers of knitted underwear and outerwear fabrics, reports a minimum of 30% increase in production from Supreme Model SA-AF knitting machines.

Advantages of the new machines are segregated by the management into the following categories: increased speed and production; versatility in making different patterns; and lower labor costs on machine tending, maintenance, and repairs. Quality of fabrics has been improved, and production costs have been reduced. Furthermore, Stone Kent has improved its position on the market by being able to manufacture new types of designs and fabrics heretofore not made on circular jersey knitting machines.

The Supreme machines were installed during 1950, and records are being kept by the mill to compare production figures with other machines in the plant.

The Model SA-AF machine is a multi-purpose, high-speed, circular jersey knitting machine equipped with four-color, constant-feed striping boxes, new-type pattern placers, and 3-position Jacquard-type pattern wheels.

the color of the dye bath while the goods are being dyed. However, they are using the instrument to check the match on finished goods, and to some extent to check on the color standards of commercial dyes. These dyers are experimenting with the Color-Eye, and they are quite sure it has many uses as a measuring instrument which they have not yet fully explored.

Textile Industries Presents

SAVE LABOR
REDUCE WASTE
SIMPLIFY JOBS
IMPROVE QUALITY
INCREASE PRODUCTION

MODERN PRODUCTION METHODS

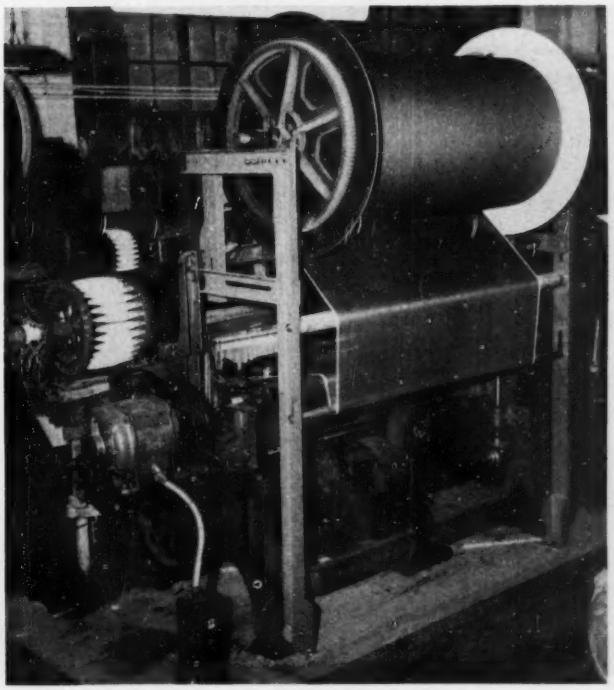
Case 29

More Production, Easy Maintenance with Overhead Loom Beams

A ONE-TIME crowded southeastern cotton mill weave room is now a much more convenient place in which to work since the looms have been equipped so that the beams are mounted overhead, instead of behind in their regular positions.

Loom parts are more accessible to the loom fixer for repairs and oiling. Trucks moving up and down the alleys cannot run into the warps. There is less likelihood of oil and grease getting on the warp since weavers, fixers, and cleaning men do not have to lean over the warp to service the loom. Smash men are the only operatives that find this arrangement inconvenient.

Typical overhead loom beam installation. Note large beam; it is 32 inches in diameter.



Not only is this overhead installation of loom beams an advantage from the maintenance standpoint—it permits the utilization of larger loom beams with an increase in yarn capacity.

Formerly 20-inch loom beams were employed on these looms. Now 30-inch beams are used, resulting in approximately 125% more yarn being wound on each beam. This, of course, provides a reduction in the amount of time that the looms must stand idle for warp tying and beam handling. Also, there is less sized yarn waste in any given period of time since there are fewer run-outs.

An overhead hoist arrangement is provided to lift the large beams onto the loom stand.

Manufacturer of these overhead loom beam supports is West Point Foundry & Machine Co.

Case 30

Graphite Remover for Nylon Laces Saves 50%

DEVELOPED by the Atlantic Chemical Co., Inc., Atco graphite remover is showing savings for plants. The International Veiling Corporation of New Jersey has used this graphite remover and found that a cleaner lace can be produced in a shorter length of time than formerly; a saving of up to 50% has been observed.

The removal of graphite from nylon lace has caused lace manu-

Textile Industries Presents

MODERN PRODUCTION METHODS

SAVE LABOR
REDUCE WASTE
SIMPLIFY JOBS
IMPROVE QUALITY
INCREASE PRODUCTION

facturers and processors endless headaches. Common detergents and ordinary methods of soil removal do not remove graphite deposited on nylon at lace machines. Atco graphite remover was developed explicitly for this purpose and is quite simple to use.

The graphite remover is poured onto the lace in the washer in sufficient quantities to saturate the lace. The machine is then allowed to run for one half hour with light pressure on the squeeze rolls. The graphite remover is gradually diluted with water over a ten minute period and then finally rinsed free. Atco graphite remover does the job well in most any kind of lace washing equipment.

Case 31

Battery-Powered Equipment Provides Improved Spinning Frame Lubrication

IN OPERATION since July, 1950, a Brown Dynalube battery-powered spindle oiler services 55 to 60 spinning frames at Swift Manufacturing Company, Columbus, Ga. Advantages noted for this equipment include savings in oil and time, and the oiler's job is easier than it was when hand oiling methods were employed.

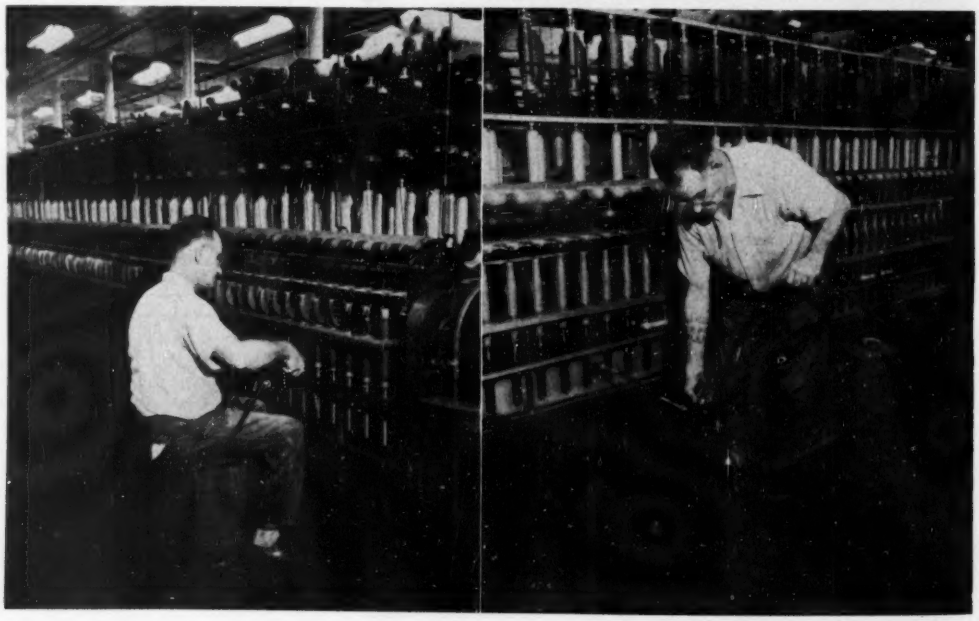
The time required to oil a frame has been reduced from eight minutes to five minutes (estimated) by using the battery-powered oiler; these figures do not include time saved by not having to refill the oil reservoir as often as on the hand type oiler. The oil reservoir on the power oiler holds five gallons of oil, and considerable oil is saved by avoiding spillage.

Less time is required for replenishing the oil supply in the reservoir. The operative is pleased with the equipment in that he sits on a comfortable seat provided on the oiler and propels himself with his feet, oiling spindles with only a slight pressure of his thumb on the hand control lever. The oiling job is easier, cleaner, and there is less time consumed going to and from the central oil supply room.

A six-volt automotive type battery supplies power to an electric pump that maintains a constant (adjustable) oil pressure of three pounds per square inch or more, with a volume of one pint per minute or more of the heaviest spindle oil.

A Brown Dynalube high-pres-

Lubricating spinning frames with Brown Dynalube battery-powered devices. Left, spindle oiler; right, grease gun.



sure battery-powered grease gun is used in this mill to lubricate bearings on spinning frames. Simple operation and large (25 lb) capacity save time and grease, and make the job easier.

The equipment formerly used for greasing was inconvenient and cumbersome for one man to handle. The gun held only five pounds of grease and frequently became clogged with lint and other contaminating elements; furthermore two men were required to operate it effectively. All of these difficulties were alleviated when the battery-powered gun was placed in service. More positive lubrication is assured, housekeeping is improved, and there is no grease wasted.

SPINNING FRAME spindles at Spartan Mills, Spartanburg, S. C., are also lubricated with the new oiler.

Filling frames are oiled every other week and warp frames every week. Four oilers handle 57 filling and 67 warp frames. The mill states that men are able to complete the oiling job in just about half of the time formerly required, there is less oil drip around the frames, and there is an estimated saving of one gallon of spindle oil per day.

The major saving is in oiling time, and most of this is accomplished through elimination of time formerly used in returning to the storeroom to refill hand oil cans.

The battery is recharged merely by plugging rectifier into any wall socket.

Case 32

Mill Cleaning Costs Lowered with Motorless, Mechanical Sweeper

IN AREAS where inaccessible shipping aisles and unwieldy cotton rolls are the rule, maintenance men at Kendall Mills, Walpole, Mass., have cast aside outmoded hand-sweeping methods and equipment. A motorless, mechanical sweeper, supplied by Handling Devices Co., Inc,. is now in use.

Mechanical sweeping finds an ideal niche in three departments at Kendall: shipping, warehousing, and in the sponging rooms. Here maintenance personnel have ascertained that the introduction of motorless sweeping into Kendall's maintenance picture has chopped annual non-productive overhead by $696.80 on one shift, and time studies are being conducted now to see what this light and portable sweeper will do on other shifts at the plant.

Where extensive floor area exists, Kendall explains, such as in the three sectors already mentioned, non-productive labor overhead is particularly burdensome. Here, two man-hours a day have been slashed off sweeping time with the mechanical sweeper. Kendall Mills have not had to bolster their maintenance platoons as the system enlarges, but have, in fact, been able to transfer labor to other departments because mechanical sweeping is five times faster than hand-sweeping methods.

Kendall emphasizes that on an annual saving of $700 a year on its sweeping costs, this motorless sweeper pays for itself in about sixty days on just one shift. Mill management explains further that standby equipment is not necessary because the sweeper requires no more maintenance than a wheelbarrow.

MECHANICAL SWEEPING finds good application in shipping, warehousing, and in the sponging rooms at Kendall Mills.

Case 33

Modernized Slashers Make Better Warp

FOUR slashers at a South Carolina mill have been completely modernized by the addition of two new features: a high speed front end incorporating a multi-motor drive, and a pneumatic friction device for the creels. The modernized slashers produce better beams containing approximately 14% more yardage.

The new front end was designed and built by West Point Foundry & Machine Co., and it uses a Westinghouse drive. This drive has

separate motors to turn the size box rolls, the delivery roll, and the beam. Stretch between the size box and the delivery roll can be adjusted and maintained by turning the knob on a rheostat, and the speed of the whole slasher can be changed as desired.

The variable speed required for the beam as it builds up is automatically handled regardless of the speed of the slasher, and a constant tension is kept between the delivery roll and the beam so that a good firm warp is wrapped. The overseer of slashing has found that the new front end allows 15% more yarn to be wound onto a beam without stretching the yarn. Formerly each beam held 1400 yards; now each beam holds 1600 yards or more.

The drive is used in conjunction with a Moist-O-Graph which varies the speed of the slasher to maintain constant regain.

The other new feature added to the slashers is a pneumatic friction device for the creels. It is necessary to put a heavier weight on the friction rope of the last beam in a slasher creel when using the standard type of friction so that this beam will not coast when the slasher is slowed or stopped. The additional friction produces excessive tension on the ends from that beam. At this mill, it was not uncommon to have 2000 yards left on the last beam when the other beams ran out.

The new device avoids waste and gives uniform tension on all beams in the creel. In fact, when the slasher is running at standard speed, there is no friction applied by the ropes. The beams run free, being held back only by the slight resistance of their bearings. When the slasher is stopped, a rod, actuated by a pneumatic piston and cylinder, permits the weights on the ropes to hang free, thereby applying friction to the beams. The weighted ropes prevent the beams from coasting to a stop and dropping the yarn.

The brake was also installed by West Point Foundry & Machine Co.

With the combination of the new drive and the pneumatic creel tension, the mill has been able to control closely both tension and stretch throughout the slasher from creel to warp beam.

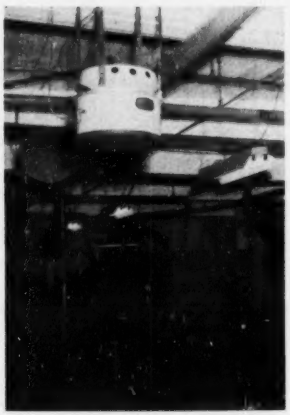
Case 34

Spot Humidification in Woolen Mill Inexpensive and Effective

OPTIMUM humidity conditions in the carding and spinning departments of Carleton Woolen Mills, Inc., Rochdale, Mass., are maintained by Walton humidifiers. Inexpensive to install, the system operates without compressors, ducts, air pressure, or water pressure. Atomizers are merely attached to the ceiling by straps and connected to the nearest water supply pipe and electrical outlet.

Two Model FT units serve each three-cylinder card set. One unit is sufficient for two 144-spindle ring frames. Rate of evaporation is approximately one gallon per hour for an individual atomizer, although total water consumption is determined by zonal requirements which are automatically controlled.

The atomizers are equipped with ball bearing motors drawing 100 watts. They are filter-protected from wool fly and dust. Vapor is directionally diffused by specially designed domes in order to avoid drafts deleterious to proper carding and spinning.



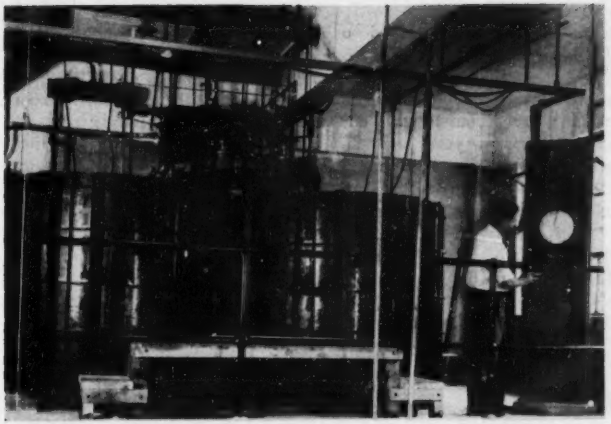
Walton humidifier hangs from ceiling in Carleton Woolen's card room.

Case 35

Instrument Controls Acid Make-Up

ROBERT C. Bogle, superintendent of wet processing, Kerr Mills, The American Thread Company, Fall River, Mass., reports substantial savings resulting from the adoption of an automatic system for making up weak acid from concentrated acid. This weak acid is used in large quantities for yarn processing.

The recorder-controller for acid strength is calibrated directly in per cent acid, so that by changing the control setting the mill can



AUTOMATIC ACID DILUTION control system at Kerr Mills, The American Thread Company, Fall River, Mass. Central instrument in the "packaged unit" control cabinet is a Foxboro Dynalog recording controller.

have any strength of acid desired. In many laboratory tests, since this installation was made, mill chemists could find no appreciable variation in acid strength from that which the setting called for.

In the installation at Fall River, provision is made for safety shutdown, and a horn sounds if air pressure should fail or other parts of the equipment become inoperative. Operating hazards are completely eliminated by various safety devices. Manual control is provided at the cabinet by simply turning a master switch from "automatic" to "manual."

The heart of the automatic control system is the recorder-controller, a Foxboro electronic Dynalog, which accurately measures the correct amount of strong acid to be added. The simple, rugged construction of this instrument (only five moving parts) insures years of uninterrupted service.

Among the important advantages gained as the result of this installation is the elimination of a burdensome and dangerous task. Closer working tolerances are attained for better and more uniform quality of product. Through saving in operating costs the installation paid for itself in less than six months.

Case 36

Steam Cleaning Helps in Rebuilding 900 Rayon Mill Looms

WHEN it was decided to rebuild 900 looms in a New England mill a program designed to prevent excessive work stoppage was arranged.

According to this plan, selected small sections of looms would be stopped and the machines removed from the weave room for rebuilding, while the balance of the machines remained in production. Meanwhile, the removed looms would be stripped of their working parts and the frames cleaned and repainted. Then the looms would be rebuilt, on an assembly line basis, by a skilled crew specializing in loom rebuilding and overhauling work.

In order to carry out the plan

Steam is used to clean these looms prior to their being rebuilt for use in mill weaving fancy rayon fabrics.

Textile Industries Presents

MODERN PRODUCTION METHODS

SAVE LABOR
REDUCE WASTE
SIMPLIFY JOBS
IMPROVE QUALITY
INCREASE PRODUCTION

successfully, it was evident that the cleaning of the frames would have to be accomplished rapidly and thoroughly so that there would be a large number prepared ahead for the rebuilding crew to work on.

Steam cleaning was decided to be the logical preparation method in this instance.

As soon as a loom was taken from the weave room it was sent directly to an open yard location. Here the inner parts were removed and the stripped frame was steam cleaned, by the mill's own personnel, with Oakite Penetrant (a specially designed detergent used in this application at a strength of 4 oz to 1 gal. of water) and two Oakite solution lifting steam guns that require for their operation only a good source of steam, hoses, and a suitable solution container.

The solution, delivered through the gun at a pressure of 65 to 70 psi, quickly removed, in one single operation, all grease, muck, oil, and paint—frames were cleaned down to the basic metal. An extra wide nozzle was used to provide maximum area coverage. Rinsing with steam alone finished the job.

After this, the frames were painted, specialists rebuilt the looms, and they in turn were again installed in the weave room and placed in production.

Cost of the steam cleaning was considered by the management to be negligible, especially in view of the savings through the use of these rebuilt looms instead of purchasing new looms.

Case 37

Knit Goods Handling Costs Decreased

"Conveyorized" presser table saves knit underwear mill from 2 to 3 cents per dozen in handling.

IN HANDLING and pressing such items as athletic shirts, T-shirts, and men's briefs, savings range from two to three cents per dozen in mills utilizing conveyorized presser units manufactured by American Safety Table Co., Inc. The quality of the pressing job is at least equal to other methods, and no goods are stacked in this operation because there is a constant flow of knit goods.

CONVEYORIZED presser in operation at Superior Underwear Mill, Bechtelsville, Pa. Each girl folding and examining is capable of placing 200 dozen a day on the belt. With eight girls feeding and three girls taking off, production is approximately 1600 dozen per day.

The Globe Mills, Inc., West Leesport, Pa., manufacturers of knit underwear, report savings of two cents a dozen on athletic shirts and two and one fourth cents a dozen on briefs in folding, pressing, and boxing. The savings are attributed to using fewer operators at the press and the convenience of boxing garments taken off the belt as they come through the press.

Superior Underwear Mill, Bechtelsville, Pa., operates a folding unit with two packers, and progress to this time has been very satisfactory. A second unit with eight folders and four packers has also proved satisfactory. In this instance the mill saves two cents per dozen at pressing as compared with the method used previously.

Myrna Mills, Inc., Mineral, Va., has in operation an Amco knit goods conveyor and pressing unit. The unit was installed in an effort to attain maximum efficiency and remain competitive in today's market. The entire finishing department is centered around the Amco conveyor which has definitely aided in cost reduction and placed within practical limits a system for almost perfect control, according to H. K. Peckham, vice-president of Myrna Mills.

In many mills the amount of goods in process is lessened, permitting considerable saving in inventory because as soon as the goods are boxed, they may be shipped.

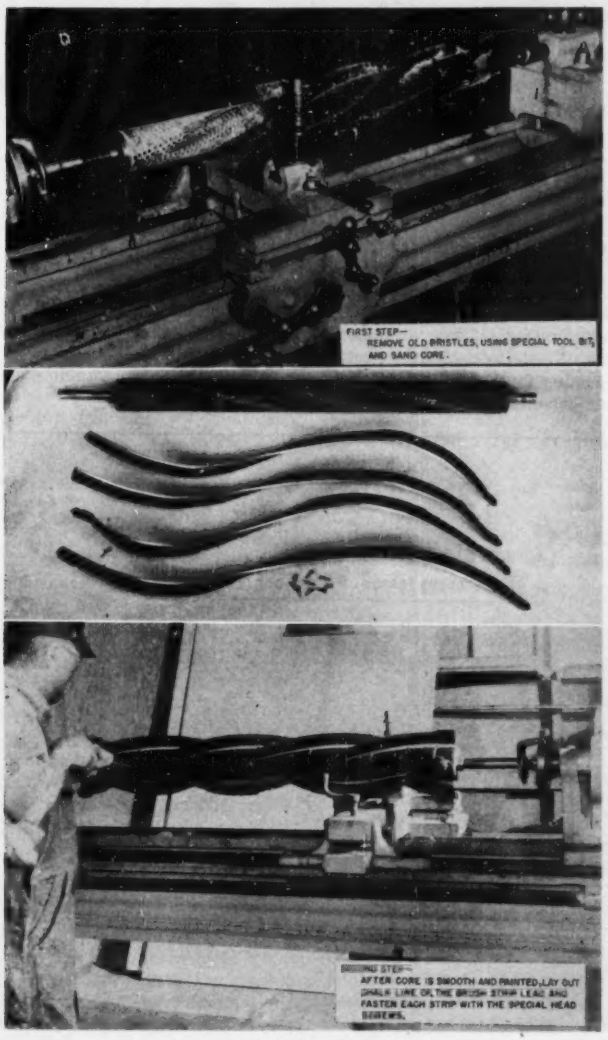
Case 38

Preformed Strips Easily Installed on Spiral Card Flat Brushes

THE REPLACEMENT of worn bristles on spiral brushes at cotton cards has been simplified by use of preformed Fullergript strips manufactured by The Industrial Division of The Fuller Brush Company.

Several mills have reported expense reductions from $35 to $50 per card over a ten-year period as a result of replacing old style brushes with this steel-backed strip. A denser brush face with consequent better cleaning and longer life is said to be obtained with this type of strip.

Worn-out brushes can be replaced in two simple steps: (1) The old tufts are trimmed off and the core is sanded, and (2) screw holes are drilled and the spiralled brush strips installed with the special screws furnished with the strips.


FIRST STEP—
REMOVE OLD BRISTLES, USING SPECIAL TOOL BIT, AND SAND CORE.
AFTER CORE IS SMOOTH AND PAINTED, LAY OUT CHALK LINE ON THE BRUSH STRIP LEAD AND FASTEN EACH STRIP WITH THE SPECIAL HEAD SCREWS.

Case 39

Less Trouble With Pad-Mounted Machines

Unisorb pads enabled mill to install spinning frames on concrete floors without expansion bolts or lag screws.

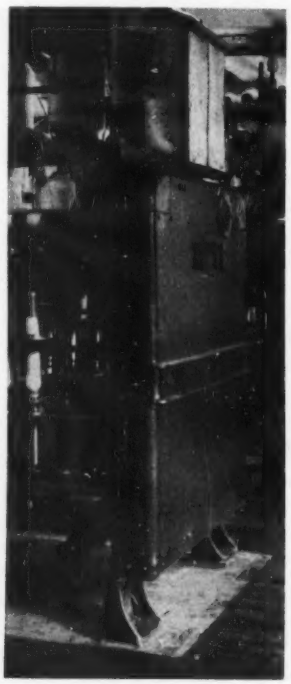
THE Clark Thread Company installed Unisorb pads under machinery on concrete floors in a new mill. Considerable trouble was expected in fastening machines with expansion bolts and lag screws, but Unisorb pads were chosen for the job and were found satisfactory for two reasons: the pads stop vibration; and they definitely hold the machines in position without any additional anchors.

After all spinning frames were fastened to the floor with Unisorb pads, it was found necessary to move some of them. Considerable difficulty was experienced in trying to loosen the pads in that they were adhered firmly to the floor. The pads, manufactured by The Felters Company, are holding in

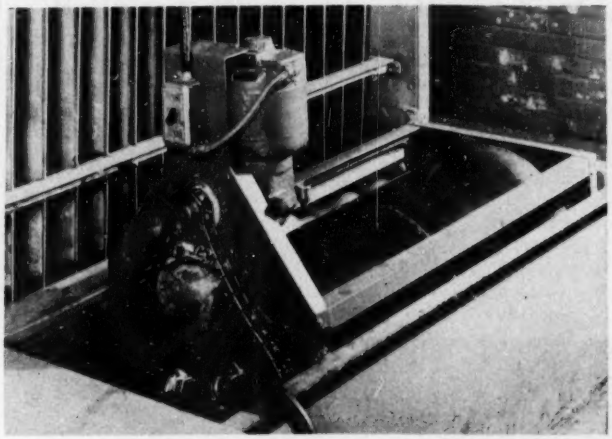
place very satisfactorily after three years of service.

Another southern mill was so well pleased with initial installations of Unisorb pads that they were installed under all spinning and twister frames and looms in the plant. In checking results, this mill revealed that the pads have helped maintain machinery in good running condition with minimum expense. Also, periods of overhauling have been extended, and there is less trouble in plumbing spindles.

UNISORB pads were used under all twister frames and looms in addition to the spinning frames as shown here.



Case 40



Self-Cleaning Tank Screens Require Less Attention

BATES Manufacturing Company has found that rotating self-cleaning tank screens prevent lint from entering the pump intake on their air washers. The Parks-Cramer self-cleaning tank screens replace a cumbersome pot strainer and vertical tank screens; formerly these units were manually cleaned. Spray nozzles inside the screens of the new unit automatically remove lint, greatly reducing the amount of labor required in maintaining the air washer system.

Case 41

Revamped Opening Lines Solve Overload Problem

IN ONE large textile manufacturing plant the opening room was located in a warehouse situated about 300 feet behind the mills. Equipment in the opening room consisted of 14 breaker hoppers, four lattice openers, and two vertical openers. The opening machines fed ten pickers. Four pickers were located in No. 1 mill and six pickers in No. 2 mill. Machinery used to feed No. 1 mill included six breaker hoppers, two lattice openers, and one vertical opener. Feeding No. 2 mill were eight breaker hoppers, two lattice openers, and one vertical opener. Stock was delivered from the opening machinery to the picker rooms by means of a pneumatic conveyor system.

The opening equipment was found to be overloaded, and the quality of cleaning was not considered sufficient. Plans were made for improvement, and all of the opening machinery, except the

breaker hoppers, was moved from the warehouse into the mills. Six additional breaker hoppers were provided to make a total of 12 feeding the No. 2 mill. Eight breaker hoppers were utilized to feed mill No. 1; in addition, four lattice openers and two vertical openers now service the No. 1 mill.

Two individual lines of cleaning equipment were set up, each line having two additional lattice openers, and one additional vertical opener. Each line of cleaning now feeds two pickers, thereby reducing the load on the cleaning machinery.

Two lattice openers and one vertical opener were moved into the No. 2 mill, and added to this equipment were two additional lattice openers, one vertical opener, and two Superior cleaners. This equipment was segregated into two lines of cleaning consisting of two lattice openers, one vertical opener, and one Superior cleaner per line. Each line now supplies cleaned stock to three pickers, and again the load on the cleaning equipment was reduced. Cotton is delivered by means of pneumatic conveyors from the warehouse to the mills.

Textile Industries Presents

SAVE LABOR
REDUCE WASTE
SIMPLIFY JOBS
IMPROVE QUALITY
INCREASE PRODUCTION

MODERN PRODUCTION METHODS

Case 42

Centralized Line Shaft Lubrication

Saves Labor, Reduces Seconds

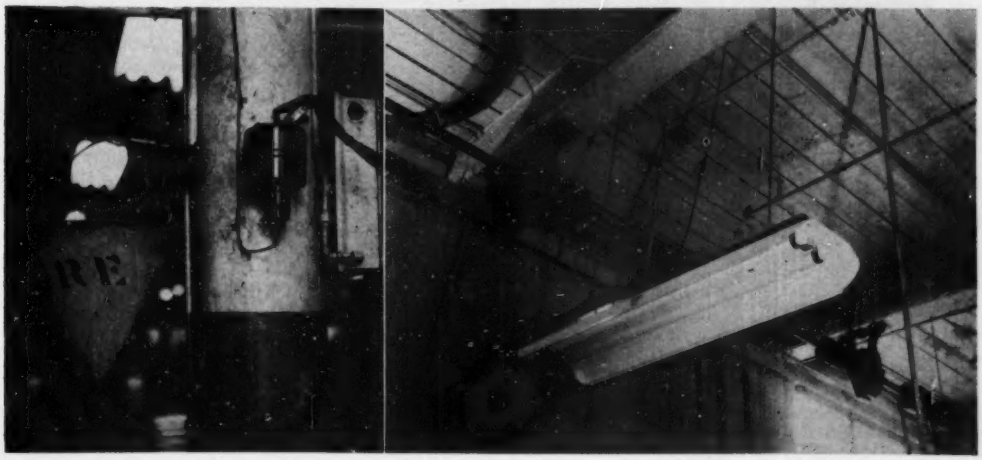
AVONDALE Mills, Birmingham, Ala., formerly oiled line shaft hangers after 240 hours operating time. A Bijur one-shot lubrication system was installed on a shaft driving 116 looms, and the 18 bearings are lubricated after 120 hours operating time. Labor saved in oiling this shaft amounts to 16 hours per week when compared to the 240-hour oiling schedule. Notwithstanding the difference in frequency of oiling, current savings on labor amount to eight hours per week.

Now a known quantity of oil reaches the bearings, and the hazardous job of oiling the hangers manually is no longer necessary. Oftentimes the oiler put too much oil on the shaft, and the excess oil was thrown onto warps and cloth, causing bad work. The old schedule called for oiling half the weave room shafts once each week. The present schedule includes oiling shafts throughout the weave room once each week.

An important feature of the system is that the oiler can be sure that the right amount of oil reaches every bearing. Some savings are realized on oil costs, but the exact amount is not known at this time. The system is expected to pay for itself in two years, on a basis of present savings. The installation has been in operation for approximately six months.

Two inexperienced men installed the entire system in 16 hours (approximately one hour per bearing), and the task was simple. The bearings were removed from the shaft, a hole was drilled in each one, and a fitting was installed in each hole before attaching the lubrication lines.

Left, central lubricating pump for line shafting. Right, note lubrication lines at each shaft hanger.



Textile Industries Presents

MODERN PRODUCTION METHODS

SAVE LABOR
REDUCE WASTE
SIMPLIFY JOBS
IMPROVE QUALITY
INCREASE PRODUCTION

Case 43

Pulley Drive On Spinning Spindles Saves 10% Labor; 50% Parts

SPINNING frames at Profile Cotton Mills, Jacksonville, Ala., are now operating at 9000 rpm spindle speed; whereas before a recent changeover, many of these same frames were operating at 7800 rpm. Meadows Manufacturing Co., converted frames in this plant from cylinder drive to pulley drive, utilizing tapes on the

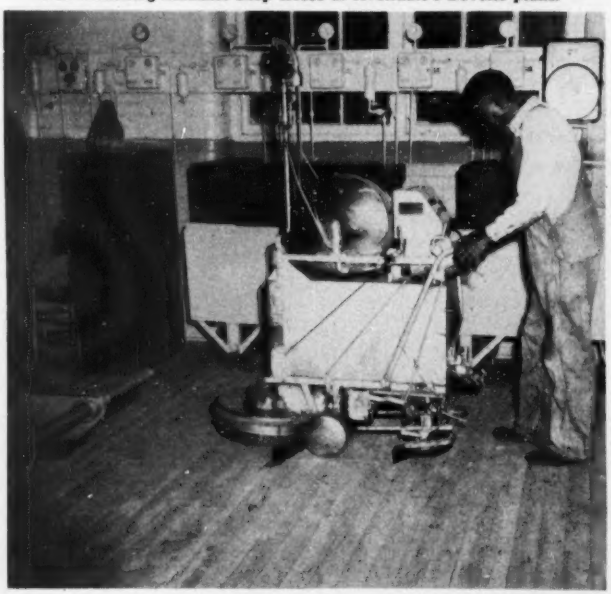
Case 44

Wet-Scrubbing System of Floor Maintenance Reduces Time and Labor Requirements

A WET-SCRUB system of floor maintenance is being used with good results at the Bevelle plant of Avondale Mills, Alexander City, Ala. Three men are employed full time to scrub floors 40 to 48 hours per week. The scrubbing machine is rented from the Finnell Company, and all maintenance on the machine is done by that firm. The mill buys replacement brushes from Finnell, the scouring solution being purchased from the Selig Co. The overall cost of maintaining floors at the Bevelle plant is .0022¢ per sq ft, including labor, scrubbing materials, and machine rental.

Formerly 12 persons were employed full time to scrub the floors manually. The scrubbing machine saves considerable time and labor in addition to keeping the floors clean throughout the mill. Good housekeeping is emphasized at this mill, and scrubbing is done on Monday, Tuesday, Wednesday, Saturday, and Sunday. The schedule is staggered to permit scrubbing in various departments when there is the least activity; some areas are scrubbed at odd intervals as they become accessible for cleaning.

Wet-scrubbing machine shop floors at Avondale's Bevelle plant.

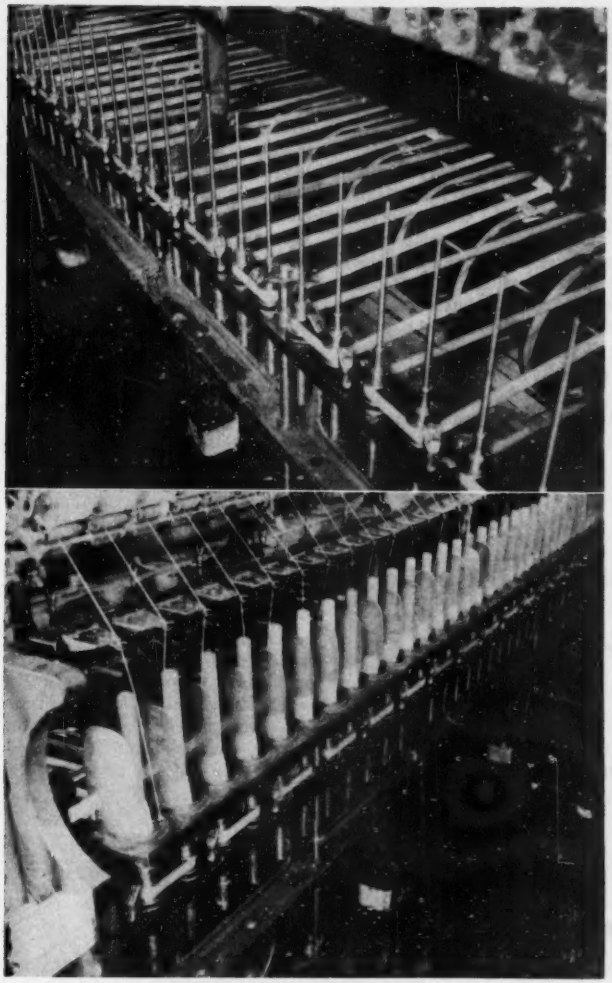


TIME AND LABOR required to scrub floors has been greatly reduced in the New Braunfels Textile Mills, Inc., New Braunfels, Texas. The reduction in costs has been attributed to use of a Finnell Model 418P scrubber-dryer machine.

A two-man crew now scrubs the weave room three to four times faster than three men formerly cleaned it using a scrubbing machine and separate vacuum unit. The self-propelled machine is designed for speed and efficient cleaning. It lays down the cleanser, scrubs, and picks up cleanser after scrubbing, all in one operation.

Correct and uniform control of the cleaning solution is saving the mill material and reducing unnecessary wear and tear on the brushes. Labor requirements are minimized in that the machine does most of the work, eliminates the need of moving additional cleaning equipment around, and fewer men can do the same cleaning job.

Labor constitutes the largest percentage of floor maintenance costs; therefore the New Braunfels Mill has found that the machine, capable of scrubbing 4000 square feet per hour, is fast returning the original investment.



PARTIALLY STRIPPED spinning frame (top photo) showing new pulley drive. Bottom photo, converted spinning frame in operation with Permalite separators, new spindles, and pulley drive.

spindles instead of bands which were formerly used here.

New bobbins, spindles, and rings were also installed, and a 5½-oz package is now obtained as compared with a 2½-oz package made on the same equipment before the change. Some old frames were operated at 9000 rpm, but there was too much trouble with cylinders and shafts, bearings, and the head end stripped from 1 to 3 intermediate gears per week on 30 frames. This condition presented a costly maintenance problem. Presently, the pulleys are driven by one shaft which is fitted with ball bearings, and there has been no maintenance on these frames since they were placed in operation after the change.

The Meadows changeovers have shown a 5% increase in production and a 10% increase in efficiency (no down-time, faster speeds, etc.), making a total of 15% increase in spinning production for the entire job, including larger bobbins, rings, spindles, and drive. In addition to savings in spinning costs, a 40% saving is effected in winding and spooling costs, according to management at this mill. Permalite separator blades were installed to accommodate the additional bobbin length.

8¼" bobbins were replaced with 9½" bobbins, and the stroke was changed from 7" to 8¼". The management at this mill is getting rid of a large variety of spindles, and is trying to standardize in an effort to economize and simplify operations in making 5s to 30s yarns from 1" to 1 1/16" cotton.

83 frames of various sizes and types were on the schedule for the changeover to pulley driven spindles, new bobbins, and rings. Saving on maintenance labor is estimated at 10%, and a 50% overall reduction in replacement parts is expected; on this basis alone the investment is worthwhile, notwithstanding the increase in production.

Case 45

Chemical Spray Cleans Looms

SPARTAN MILLS, Spartanburg, S. C., has had good results from a new chemical, called Moco Metal Cleaner, which they are using to clean their looms. The cleaner is manufactured by Moreland Chemical Co. The mill is using it for cleaning looms when warp is out.

The cleaner is applied as a spray through a compressed air spray nozzle. Filling is taken out

of the battery, and oilcloth is used to cover the cloth roll while the loom is being cleaned. After the cleaner is applied, it is blown off with a standard compressed air nozzle, and the loom is left free of lint, oil, and starch deposits.

Spartan Mills have been cleaning one loom per shift, but after all of the looms have been cleaned, a regular schedule will be set up so that cleanliness may be maintained.

Currently, the cleaner is being used as a mixture of one part cleaner to 10 parts water, but after the initial cleaning, a 1 to 20 formula is considered satisfactory. The cleaner does not have any tendency to cause rust, and it is doing an excellent job.

The same cleaner is being tried on spinning frames and cards, and so far it shows considerable promise for these applications.

Case 46

Circular Knitters for Argyle Socks Prove Profitable Investment

SEVERAL Banner, solid color pattern, circular knitting machines have been in use in Windy City Knitting Mills, Inc., Hickory, North Carolina, since April, 1950. There are now two sets (24 machines) in operation on two, ten-hour shifts a day, and the new machines have proved to be a profitable investment in making Argyle socks.

These 108-needle machines use four wheels each and produce half-hose of a true edge-framed Argyle type. By using four wheels, the Argyle diamond can be of four different colors and the top and foot can be of another. These diamonds are different from those produced on a reverse wrap machine in that these are actually knitted separately and then sewn together automatically.

At Windy City they are using one knitter to twelve machines and have two fixers on the first shift and one on the second. These circular knitting machines require adjustments from time to time, but Russell Whitlock, superintendent, does not think they are excessively troublesome in view of the fact that they are entirely new machines which work differently from other half-hose knitters.

This mill was careful to make sure they knew what they were doing before trying to run the machines, and they attribute their success in operating them to having sent their fixers to the Hemphill Company plant in Pawtucket, Rhode Island, to learn the machines' design and construction before starting them up. Also these machines were set up and adjusted one at a time, and each was running smoothly before the next installation was begun.

Clipping of the ends inside the hose is done by hand rather than with an electric clipper. They are handled this way because the slow speed of the machines gives the knitters plenty of time to clip as the socks are finished.

R. G. Hafer, president and general manager, feels that the machines are doing a great job—especially since they are of a new design. He feels that new improvements may increase their speed, and perhaps other refinements may make them easier to keep in adjustment. He also feels that they are a profitable investment as long as there is a demand for framed solid color pattern Argyles at a premium price.

Case 47

Conveyor Saves Mill $8,000 Yearly

Overhead type zig-zag conveyor transports laps from sliver lappers to drawing frames.

JOANNA Cotton Mills Co., Joanna, S. C., is saving an estimated $8,000 per year in labor costs in the drawing room through the use of a recently installed sliver lap conveyor. The conveyor is similar in type to overhead picker lap conveyor systems, which have been previously described in TEXTILE INDUSTRIES, except that it handles sliver laps, suspended on wire, basket-like racks.

As may be seen on the accompanying plan drawing of the carding and drawing room at Joanna, the sliver lappers are located at one end and at the center of the room, and the drawing frames are at the opposite end. Before the installation of the conveyor, sliver laps had been taken from the sliver lapper, and moved on special hand trucks to the drawing frames where they were removed and placed in racks arranged underneath the drawing frame heads.

Now, when the sliver lappers

are doffed, the laps are placed on one of the racks of the continuous chain conveyor as it passes. Following the path of the conveyor, each sliver lap arrives at the drawing frames where an operator removes it if needed to refill a frame. Since one sliver lap makes exactly one can at drawing, doffing and reloading are simplified, and there is no need for piecing-up. The nine lap winders feed 42 five-roll drawing frames.

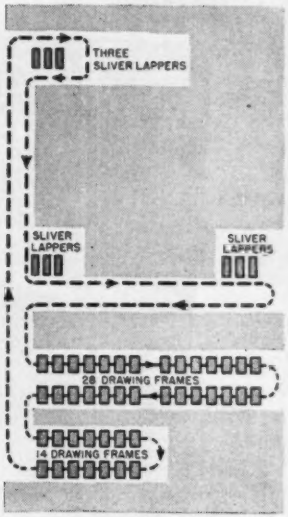
The sliver lap conveyor is of the zig-zag design, manufactured by Richard Wilcox Mfg. Co. It uses a special endless chain, driven by an electric motor and speed reducer located near the ceiling at a point where the chain is operating at its highest level. The chain drops down to a lower level above both the sliver lappers and the drawing frames to permit easy loading and unloading.

Several speeds are available, and at Joanna they have been able to find a basket spacing and a chain speed which, in combination, permit the demand for sliver laps at the drawing frames to almost exactly correspond to the rate at which the laps arrive from the winders. It is seldom that a sliver lap makes the full circuit without being removed from the conveyor.

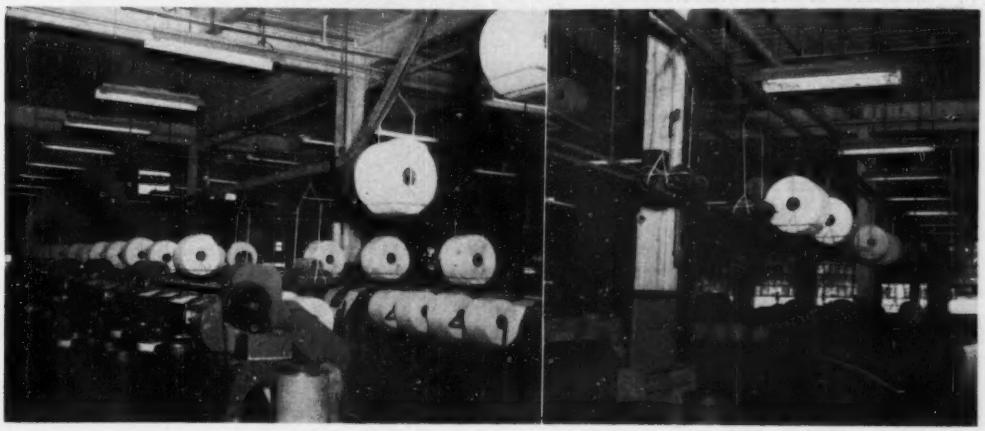
The spacing of the baskets is of some importance. They run low over the drawing frames, and when a lap is removed from the conveyor to be loaded on a frame, the conveyor basket following should not be spaced so closely that it comes up and interferes with the operator who is in the process of threading. The spacing and speed at Joanna are such that the operator has just enough time to load a lap from one basket before the next basket comes along.

A constant rate of delivery can be had by using a high chain speed and wide spacing of carriers, or a lower chain speed with closer spacing. A little experimenting soon indicated the proper conditions for Joanna.

CARRIERS MOVE DOWN to low level as they pass sliver lappers (extreme left) so that they may be easily loaded.



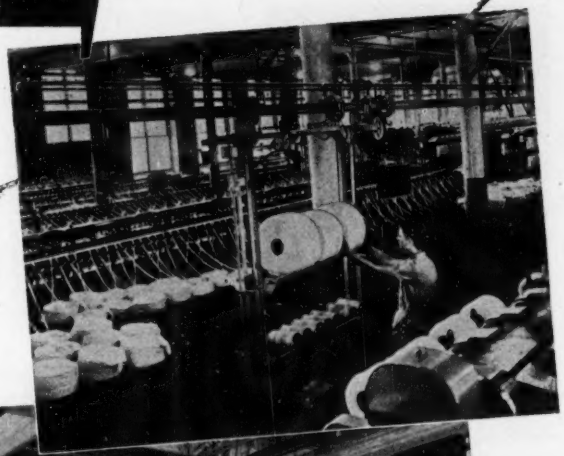
CONVEYOR OVER DRAWING FRAMES. Carriers pass up one row of frames and back down the next. Sliver laps are taken from carriers and creeled in on drawing frames. Note in photo at right that conveyor is used to return empty spools to the sliver lappers. Spacing of baskets is of some importance to efficient operation.

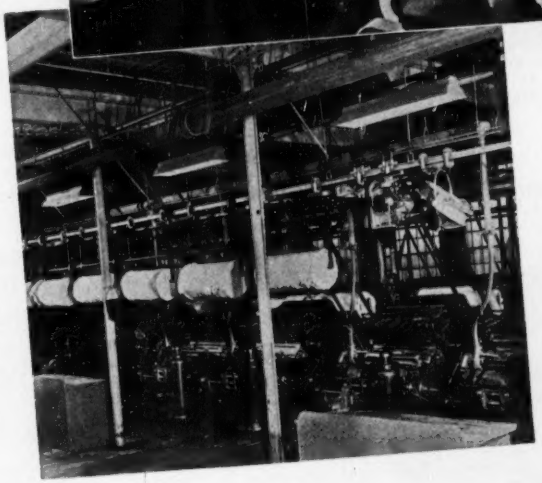


INCREASE PRODUCTION NOW...

WITH **Present Plant Manpower**

Present Plant Space





The next time you walk through your plant, cast your eyes toward the ceiling and you'll realize that there is mighty valuable space that can be put to work—without increasing your plant capacities and without increasing plant manpower.

An American MonoRail engineer will show you how you can use your "air rights". With thousands of overhead handling installations from which to draw, each with many money and time saving advantages, it will pay you to investigate American MonoRail Overhead Handling Systems. Send for bulletin C-1.

THE AMERICAN MONORAIL COMPANY

13106 ATHENS AVENUE **CLEVELAND 7, OHIO**

Case 48

Size Viscosity Controls Credited for 20% Loom Stop Reduction

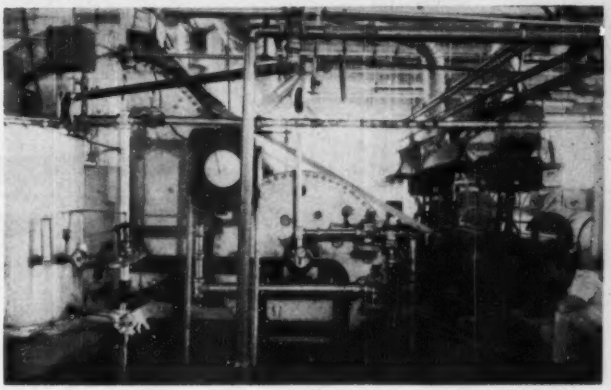
SEVERAL Norcross Viscometers have been in operation for approximately 10 months with excellent results in one large Georgia mill producing broadcloth. The installation was made in an effort to obtain and maintain uniform viscosity of the size mix.

A Viscometer mounted on the size storage kettle provides a visible record of the viscosity at all times. This feature prompts the operator to be careful in making up the size mix.

The entire system of controls includes the meter, which provides the reading of viscosity, and a pump which recirculates the size mix and maintains the mix at a predetermined and pre-set viscosity. A pen on the Viscometer makes a mark every 3 minutes showing the viscosity, and the pump starts automatically when necessary to maintain the pre-set viscosity.

It is necessary, for best results with the Viscometer, to first seek and find the proper viscosity for best weaving on the type of goods being run.

This mill ran loom stop tests every 8 hours for several weeks until they found the desired viscosity of size to use in slashing to obtain best results in weaving. Usually the size mix is made slightly thicker than necessary because it is easier to thin the mix than it is to make it thicker, should varying conditions require such. The Viscometer helps maintain the selected viscosity.



VISCOMETER is mounted on storage kettle at left, and the large instrument mounted on slasher records viscosity. Operative points to recirculating pump located under size box.

This mill now has two installations on slashers and one on a storage kettle. Results have been so favorable that two additional sets of controls have been ordered for other slashers. Approximately 20% less loom stops have been noted since the desired viscosity was established and maintained through use of the control system. It took several months to establish standards and to set up controls effectively.

Case 49

Pneumatic Device Lowers Peralta Maintenance Costs

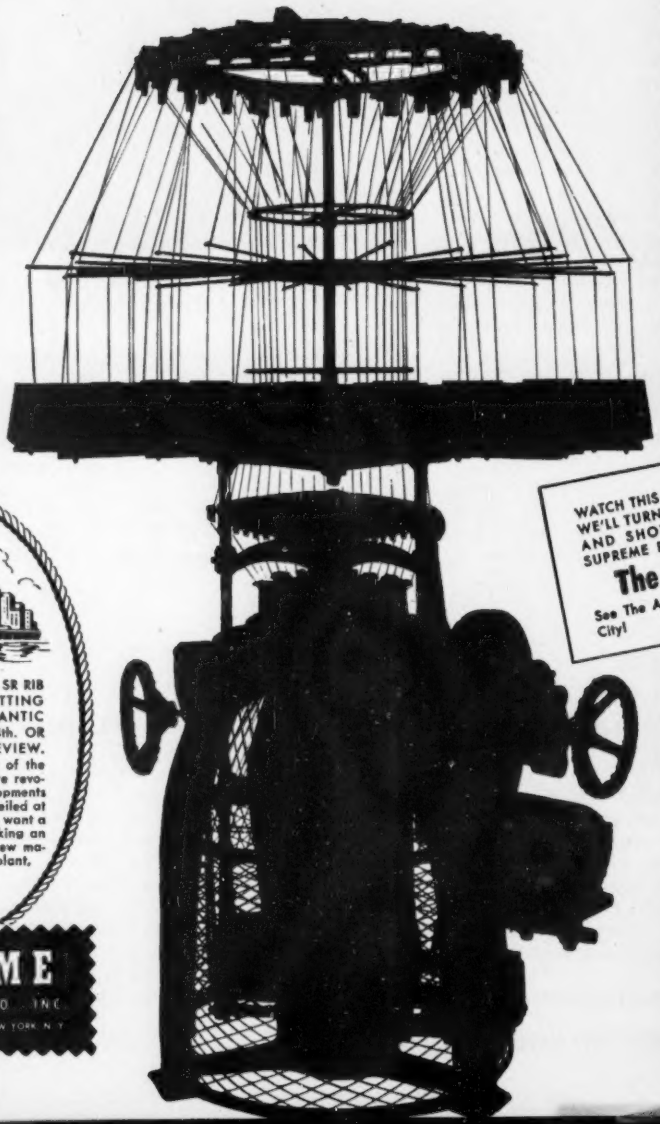
THE PERALTA machine has been described as "one of the most impressive improvements ever made in wool manufacturing." Recent modification from spring loaded crush rolls to fingertip-controlled pneumatic loading promises to add still further to its prestige.

First installation of its kind has been made at Dorr Woolen Co., Guild, N. H., manufacturers of auto fabrics. Here, a Foxboro pneumatic loading system was incorporated with the Peralta machine.

Heart of the system is a set of air motors operated from the mill's 80 psi air line; these supply the necessary force to weight the rolls. The two motors are coupled to the burr crusher by means of adapting plates furnished by Duesberg-Bosson of America, Inc. Conversion from the old spring loaded mechanism to the new type was made in a few hours.

The unit's controls are contained in a compact panel. Desired loadings for various grades of wool

SUPREME opens the door to...



WATCH THIS SPACE NEXT MONTH! WE'LL TURN ON THE SPOTLIGHT AND SHOW YOU THIS NEW SUPREME PRODUCTION STAR—

The MODEL SR

See The Actual Machine At Atlantic City!

SEE THE NEW SUPREME SR RIB MACHINE AT THE KNITTING ARTS EXHIBITION ATLANTIC CITY, APRIL 30th-MAY 4th. OR ASK FOR FACTORY PREVIEW.

This ad tells only part of the story. You'll see even more revolutionary technical developments when the Model SR is unveiled at Atlantic City. Knitters who want a preview can get it by making an appointment to see the new machine at the Supreme plant, right now.

SUPREME

KNITTING MACHINE CO., INC.

107 JOHNSON AVE., BROOKLYN 6, NEW YORK, N.Y.

BETTER PRODUCTION OF RIB CLOTH

SUPREME KM Co.

Knitting News

SUPREME ANNOUNCES NEW SUPER-RIBBER

New Supreme Ribber Utilizes Latest Technical Advances To Give Tremendous Production And Quality Bonus

Before buying his next machine, the ribbed cloth knitter should see how Supreme's new machine will improve quality and increase production. Some of the advantages that can be told now are listed below. At the official unveiling at The Knitting Arts Exhibition, even more important features will be shown.

Some Of The New Model SR Advantages

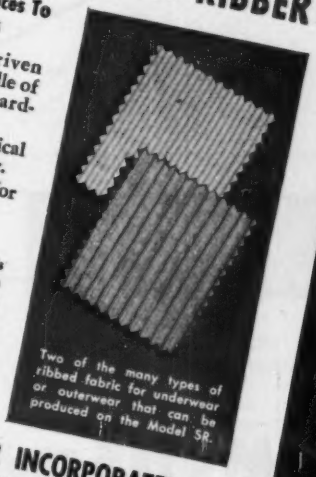
- Dogless construction eliminates longitudinal pinch lines in cloth.
- Single-action, micrometric, dial-elevating and lowering adjustment provides:
  1. Accurate and uniform stitch adjustment at the flip of a finger.
  2. Quick and easy access to the cloth at the knitting level.
- Channelled needle cam track, designed to lock needles in their proper position at all times.

Supreme Super-Ribber Construction Features Include:

- Open tripod construction throughout the machine.
- Large open area around cylinder and dial for easy cleaning and maintenance.
- Overhead, gear-driven dial with center spindle of special alloy steel, hardened and ground.
- Roller bearing vertical drive to upper dial gear.
- Roller bearing thrust for entire center drive.

Model SR Machine Sizes

7"	10 Feeds	17"	24 Feeds
8"	12 Feeds	18"	26 Feeds
9"	12 Feeds	18"	26 Feeds
10"	14 Feeds	19"	28 Feeds
11"	16 Feeds	20"	28 Feeds
12"	16 Feeds	21"	30 Feeds
13"	18 Feeds	22"	30 Feeds
14"	18 Feeds	23"	32 Feeds
15"	20 Feeds	23" to 30"	with feeds increased proportionately
16"	22 Feeds		
	24 Feeds		



Two of the many types of ribbed fabric for underwear or outerwear that can be produced on the Model SR.

NEW SUPER-RIBBER INCORPORATES SUPREME PROVEN-IN-USE FEATURES

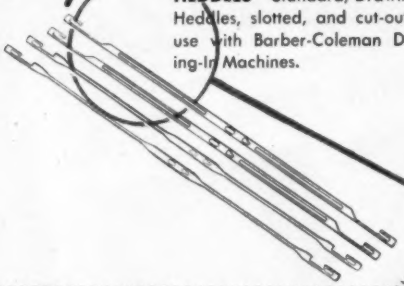
Supreme's entirely new line of high-speed circular rib knitting machines includes many of the revolutionary production-improving features which have made Supreme's circular jersey machines so successful.

These production-boosting features include:

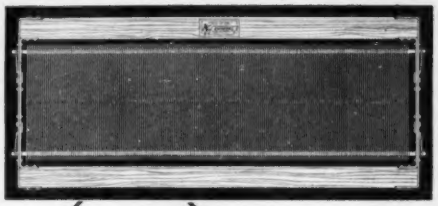
- *Stationary Yarn Stand* — Permits greater RPM of the cylinder, dial and knitting elements system; lets the knitter use double cone system with "pig-tail" double tieups. Assures faster stopping and starting . . . greater safety and efficiency.
- *Revolving, Floating Take-Up and Roll-Up*—Interwinding, roller-bearing supported. Uniform tension assures large, even and compact cloth rolls. Independent support prevents wear on cylinder and outer ring.
- *Unit Motor Drive* — Rugged, smooth-running. Patented multi-disc clutch gives almost instant start and stop. No slippage. Smooth, silent chain drive unaffected by lint or dust.

ESTABLISHED IN 1867

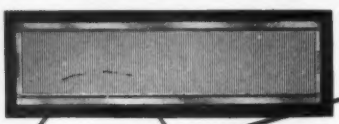
84 Years of Constant Product Improvement!



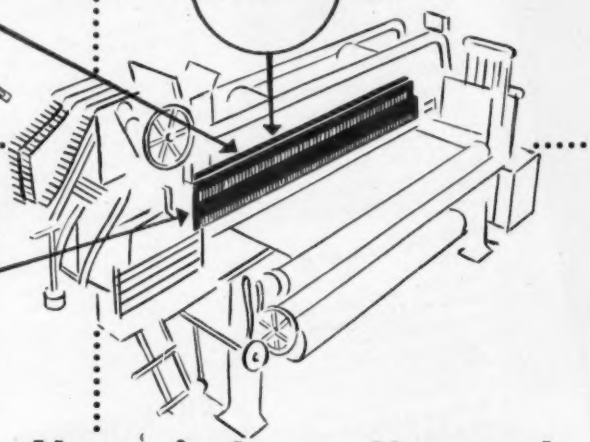
HEDDLES Standard, Drawing-In Heddles, slotted, and cut-out for use with Barber-Coleman Drawing-In Machines.



HEDDLE FRAMES Wooden, aluminum, magnesium and Drawing-In.



REEDS Pitchband, all-metal, including stainless steel and the new "RigidReed*".



EMMONS *The Name in Loom Harness!*

Again pacing the field, EMMONS has developed a new aluminum rib reed which is stronger, more rigid and more accurate. Write for full information on the *"RigidReed"** today.

You can always depend on EMMONS to be *FIRST* with the latest and the *best* loom harness!

* TRADEMARK REGISTERED; PATENT APPLIED FOR

EMMONS SELVAGE HARNESS • EMMONS SLASHER AND STRIKING COMBS
• RUN-RITE PLASTIC SHEAVES AND TAPE TENSION IDLERS

(• Distributors in New England, Canada & Export — Manufactured by National Plastics, Inc.)

You'll Find EMMONS "E" MEN At:

NEW YORK
W. S. TAYLOR
52 Vanderbilt Avenue
Phone Lexington 2-6060

CHICAGO
ALBERT R. BREEN
80 E. Jackson Blvd.
Phone Harrison 7140

ATLANTA
ARTHUR HARRIS
P. O. Box 1982
Phone Main 2643

CHARLOTTE
Branch Plant
GEORGE FIELD, Mgr.
P. O. Box 2036, Phone 3-7503

SAN ANTONIO
W. H. GIBSON
1743 McKinley Ave.
Phone L 2-9451

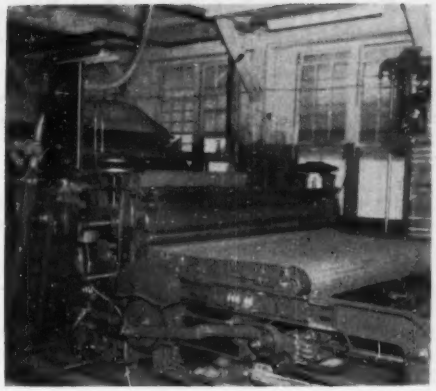
GREENSBORO
R. F. COX, Box 221
Covering the Carolinas
Virginia & Tennessee

LOS ANGELES — E. G. PAULES, 1762 West Vernon Ave.
Covering the West Coast and British Columbia

CANADA — IAN M. HALDANE CO.
P. O. Box 54 — London, Ontario

EMMONS **WEAVE ROOM EQUIPMENT**

Main Office and Plant: EMMONS LOOM HARNESS CO., LAWRENCE, MASS.



Fingertip-controlled pneumatic loading mechanism on Peraltas permits precise regulation.

stock can be duplicated precisely with a pressure regulator. Readings can be observed on a pressure gauge calibrated from 0 to 100 in 1 psi scale graduations. At 0 reading, the dead weight of the top roll exerts a pressure of 1 ton. At this mill, the indicator is set to read 20-25 pounds, or about 3½ tons.

Also included in the panel are the load-off air switch which provides instant load and release, an air strainer, a gauge cock, and a gauge damper.

One feature of this pneumatic system is its inherent ability to load both ends of the top crush roll shaft identically and simultaneously, allowing uniform wear and longer life for the radially crowned rolls. In addition, roll distortion and bearing failure due to overloading or uneven loading are averted. Roll scoring is reduced by the air "cushion" effect.

Case 50

More Effective Cloth Inspection with Variable Speed Drives

INSPECTION of cottons, industrial sheet, bag goods, and print cloth at the Crystal Springs Bleachery, Chickamauga, Georgia, has been greatly aided by the installation of variable speed drives on several inspection tables.

The change-over from constant to variable speed operation was first made on a single table. In place of the single speed a-c motor, formerly used to drive the table, a small (1½ hp) adjustable speed V*S drive developed by engineers of The Reliance Electric and Engineering Company, was substituted.

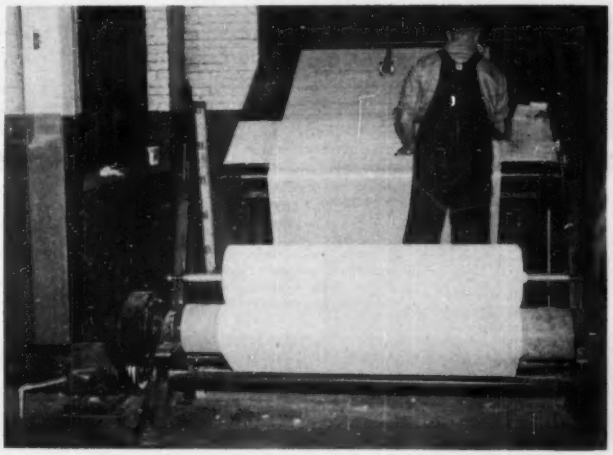
Basically, the new drive consists of 4 components:

(1) A d-c motor with integrally-mounted brake and speed reducer which is connected through V-belt to the inspection table mechanism.

(2) A foot-treadle-operated "stop-start" switch.

(3) A separate table-mounted control station containing "speed-setting" rheostat and "forward-reverse" switch.

(4) A control unit, "wall-mounted" at a distance from the table, in addition to providing controlled electronic current rectification, includes the necessary enclosed contactors and overload re-



RELIANCE d-c motor (lower left) has integrally mounted brake and speed reducer and is connected through V-belt to inspection table mechanism. Speed and direction controls are mounted at edge of table to right of operator.

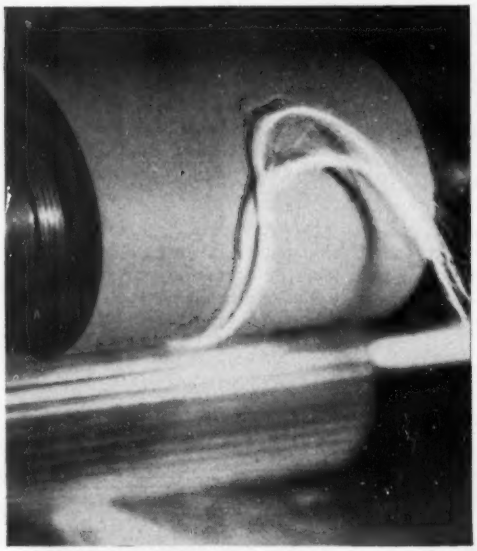
Basic cause of lapping eliminated by this patented compound

There's an exclusive difference in Armstrong's Accotex® Cots. These synthetic covers are compounded with certain electrolytes which counteract the normal attraction between fiber and cot. Accotex Cots actually tend to repel broken ends, as the diagrams below show.

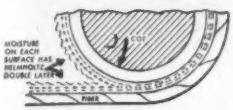
High lap resistance, however, is only one of the Accotex advantages. Another is the tough synthetic rubber compounds from which these roll coverings are made. Accotex compounds aren't affected by oils, dyes, or commonly used textile solvents. They won't sweat and they won't flatten during shut-down periods. Cots made from these Accotex compounds take months of front-line service without perceptible wear. As a matter of fact, mill after mill is getting five to six years' spinning from its Accotex Roll Coverings.

Since spinning conditions differ from mill to mill, Armstrong offers a complete line of specialized Accotex Cots. Whether you are spinning cotton, wool, or synthetics, you can get a lap-resistant cover especially formulated for your type of job from Armstrong. They are made in straight rubber compounds as well as cork-and-rubber combinations.

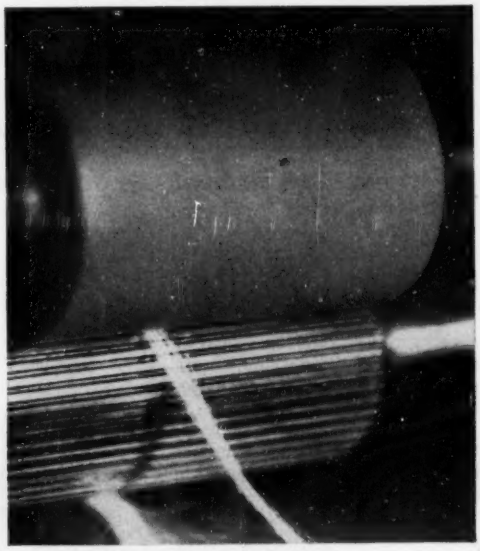
For a trial installation, call your Armstrong representative or write Armstrong Cork Company, Textile Products Dept., 3602 Arch St., Lancaster, Penna. Available for export.



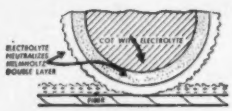
THIS COT LAPS



THIS COT LAPS. Moisture layers on fiber and cot contain electric charges that attract fiber to cot. When pressed together, the two moisture layers have an adhesive effect.



THIS COT DOESN'T LAP



THIS COT DOESN'T LAP. Electrolyte incorporated in patented Accotex rubber composition neutralizes electric charge in moisture layer on cot. This eliminates adhesive effect.

ARMSTRONG'S ACCOTEX COTS

lays for operation of the system.

Taking power from the same plant a-c line as previously used, the new drive makes it possible to move the cloth over the table at any desired speed within an 8 to 1 range. Normal inspection runs are handled at 30 to 40 yards per minute, and an overall average of 25 yards per minute is maintained for material requiring extra close checking.

Major contributions of the new drive, in addition to this new-found flexibility of speed, are the ability it gives the operator to reverse at will the direction of travel of the cloth, or to stop it instantly.

Direction controls and speed controls are at all times within easy reach of the operator. Five more Reliance drives, identical in all respects to the original one, are being installed just as rapidly as possible to modernize as many more inspection tables.

Case 51

Tension Meter Helpful in Processing Synthetic and Elastic Yarns

A LARGE New England mill making nylon parachute cloth for the armed forces had encountered difficulties in meeting government specifications. Realizing the importance of proper and uniform tensions in the manufacture of this fabric, the mill management issued instructions for the purchase of a Saxl tension meter.

Quilling. The instrument was first used in the quilling department where Abbott winders are employed to wind the filament nylon filling yarn on quills. Winding tension was checked on each spindle and all in turn were adjusted to produce uniform tension on the yarn as it is wound onto the quills.

Rejects because of filling yarn that had been stretched due to excessive tension in winding were reduced. Also, it was possible to increase winding speeds without sacrificing uniformity of tensions. It is now standard procedure to check periodically the winding tensions to maintain quality production in this operation.

Warp Preparation. This same hand-operated instrument is used in the warp preparation department for checking the tension on yarns as warps are being made. Uniform tension settings for individual ends have been made, and the number of ends down has been reduced. Not only has the speed of the warping operation been increased as a result, but also warp streaks due to individual overstretched warp yarns are avoided.

Shuttle Tension. A third use for the instrument at this mill is the measurement of shuttle tension. The tension meter is used in conjunction with the Saxl shuttle tester (as described in article beginning on page 131 of the October, 1950, issue of TEXTILE INDUSTRIES) as an aid in adjusting the shuttle tension devices and furring the shuttles properly. This procedure has also contributed to the reduction in the number of defects in the woven fabric.

As a result of the successful experiences with the tension meter in this particular plant, additional instruments have been purchased and sent to other mills in the chain where synthetic yarns are processed to assist in standardiz-

Case 52

Electric Pressure Gun Speeds Wool Spinning Frame Lubrication

ALEMITE hydraulic fittings on Whitin Model E ring spinning frames at Carleton Woolen Mills are guaranteed clean oil by an electric power gun. Using a Lincoln Lubrigun, operatives avoid product spoilage, contamination, and waste.

Head ends of frames are quickly serviced, thereby avoiding excessive down-time for lubrication. The extension cord allows almost unlimited mobility for the unit which is small enough to pass through narrow spinning aisles.

UNION SPECIAL

...to help you

CUT COSTS, IMPROVE PRODUCTION!

All of the facilities and resources of Union Special Machine Company are concentrated on one objective: *industrial* sewing machines—specially designed TO HELP YOU CUT COSTS, IMPROVE PRODUCTION! The Union Special products you order today are actually more than just sewing machines. In every sense of the word, they are modern MACHINE TOOLS, each highly developed and precision-built for specific production jobs. And never have they been a *better* investment . . . FOR TODAY . . . FOR THE FUTURE!

UNION SPECIAL MACHINE COMPANY
407 N. Franklin St., Chicago 10, Illinois

ing quilling and warping procedures.

Elastic Fabrics. In the manufacture of elastic fabrics, such as those employed in the making of girdles and surgical garments, a Connecticut mill incurred difficulties with the contractile properties of the cloth.

It is well known that properly finished elastic garments should have just the right stretch—not too much, not too little. This stretch is largely governed by the tensions first used in making the elastic yarns (for the core as well as the wrapper) and thereafter in preparing the warp and filling for weaving the elastic fabric.

A deviation from the standard tensions shows up here immediately. For instance, a yarn laid into a girdle type fabric under excessive tension will contract more than the other yarns when the tension is released, resulting in a wavy appearance in that portion of the fabric. Such a puckered-up place is enough to lower the merchandising value of a piece of elastic cloth.

Also, if the finished cloth has wavy and wrinkled selvages (caused when the selvages are put into the cloth under excessive tension), it will not bring a top price.

These defects, for all practical purposes, have been eliminated by using the Saxl tension meter to ascertain that the warps were made with yarns leaving the creel under uniform tensions.

With the more uniform tensions during warping, the increased production of high quality beams, and the more uniform filling winding tensions, worthwhile improvements have been made in the processing of this expensive elastic cloth. Rejects went down to less than one-half. Production on the warper increased about 15 per cent.

Textile Industries Presents

SAVE LABOR
REDUCE WASTE
SIMPLIFY JOBS
IMPROVE QUALITY
INCREASE PRODUCTION

MODERN PRODUCTION METHODS

Case 53

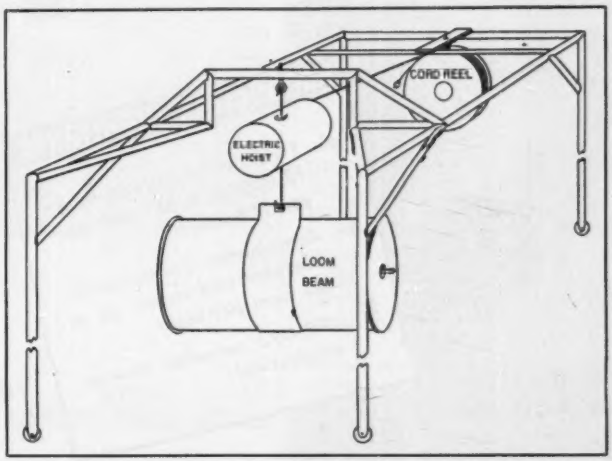
Loom Beam Handling Problem Solved with Gantry Type Device

AT THE Gainesville plant of Chicopee Manufacturing Corporation of Georgia a recent installation of 100 new looms in a small room created a difficult problem in the handling and transporting of full warps. Due to limited floor space, it was necessary to make some of the warp alleys too narrow to allow the passage of the new 24" warps if carried on the small hand truck or warp dolly. The problem was to provide a safe, economical means of lifting the full warp above the height of the whip roll and moving it to the loom in this position.

Because of the small number of looms involved it was considered impractical to install a complete overhead conveyor system. A hydraulic jack-lift truck was tried, but this proved to be unsatisfactory because of the safety hazard, both to personnel and equipment; the height of the load and the small base of the truck made it very difficult to maneuver across alleys and around posts and other obstructions.

The handling equipment finally installed was a home-made device resembling a gantry. It consists of a metal frame, mounted on casters, of sufficient width and height to permit a full warp to be suspended inside the frame high enough to clear the whip roll, and of sufficient length to "straddle" a loom. An electric hoist was mounted on one end and an electric cable reel on the opposite end. A wide leather band was provided as a means to attach the hoist chain to the warp. With this device it was possible to raise the full warp to the necessary height, push the entire load over a line of looms, and then lower the warp into position on the empty loom (see sketch).

The use of the device eliminated the need of a costly overhead conveyor system for a small number of looms and provided an adequate, safe means for handling the full warps.

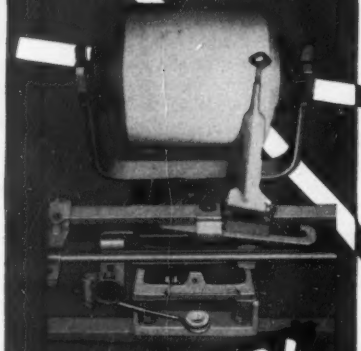


It's a PRODUCTION FACT

with the high-speed —HEADLESS PACKAGE— U.S. ACME FACE DRIVE —TWISTER—

You can

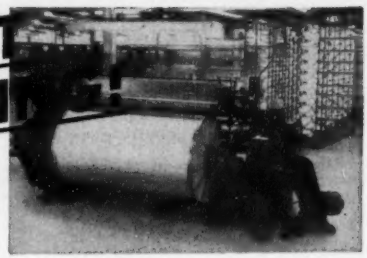
★ INCREASE PRODUCTION!
★ IMPROVE QUALITY!
★ ELIMINATE REDRAWING!
★ PRODUCE 1-lb. to 1½-lb. KNOTLESS PACKAGES!



NO FLYER!

DIRECT to AUTOMATIC QUILLING or HIGH SPEED WARPING

WITHOUT REDRAWING



PRODUCTION HIGHLIGHTS

★ Twist without flyer up to 15,000 R. P. M. with balanced bobbins!
★ Combination yarns, voiles, acetates and nylon up to 35 turns per inch!
★ 178,096 spindles now in production!

Yes, it's a fact—yarn twisted on the U. S. Acme Face Drive Twister goes DIRECT to the quilling or high speed warping operation without redrawing! It's a time and cost saver, a production booster that turns out top quality knotless packages from 1-lb. to 1½-lb. WRITE FOR COMPLETE INFORMATION . . .

U. S. TEXTILE MACHINE CO.
700 GILLIGAN ST.
SCRANTON 8, PENNA.

Textile Industries Presents

MODERN PRODUCTION METHODS

SAVE LABOR
REDUCE WASTE
SIMPLIFY JOBS
IMPROVE QUALITY
INCREASE PRODUCTION

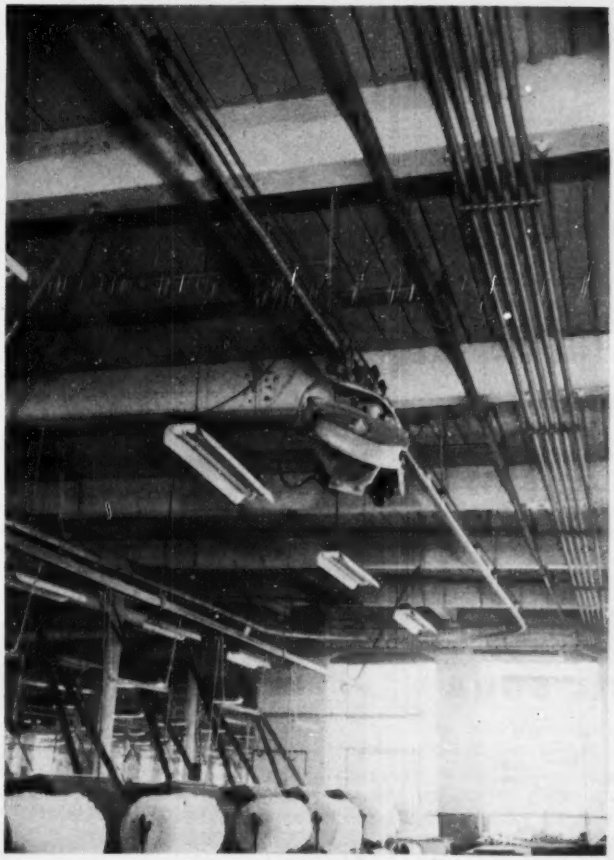
Case 54

Ceiling Cleaner Investment Amortized in Two Years, Says Alabama Mill

OPELIKA Mills, Opelika, Ala., installed American Mono-Rail ceiling cleaners in the card room in 1947 and paid for the investment in two years by saving on week-end blowing down overhead. The ceiling cleaner reduced the amount of unpleasant work for the cleaning crew, and dirty lint and tags are less prevalent.

Present cleaning schedules call for blowing down overhead once every eight weeks; however the ceiling is kept much cleaner than it was prior to installation of the ceiling cleaner. The quality of work has been much better since the cleaner was installed, and very little lint accumulates on the ceiling. The cleaning equipment does the job well and is liked by the operatives.

Note clean ceiling maintained by traveling overhead cleaner.



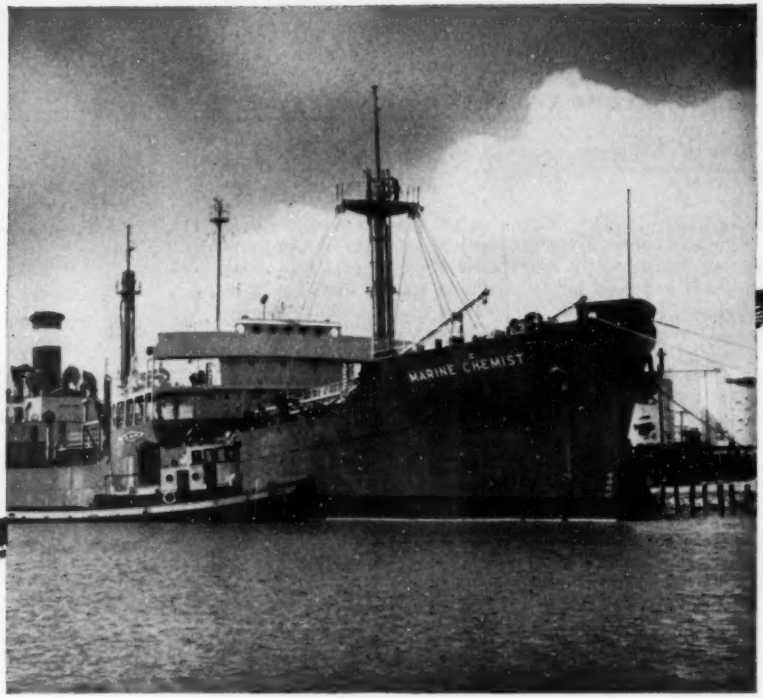
Case 55

Magazine Creel Affords 30% Saving in Wool Warping

A NEW McBride SRM magazine creel was recently installed in a leading Pennsylvania woolen manufacturing plant, and initial studies of its operation show that it has cut the warping costs by more than 30%, and at the same time more than doubled warping speeds. It solved a number of production problems for the company.

The method that it replaced required the use of small creels for the transfer of yarn onto jack spools. The jack spools were in turn placed in the larger creel and reeled onto the beaming frame, then to the loom beam. In addition to being slower, this method caused a number of problems, including the necessity for frequent end tying, that required time and left knots. Two to three hours were required for the setup of the new pattern and was all lost time from the production viewpoint. The use of different sizes and types of yarn packages was difficult and frequently required additional winding operations.

The McBride magazine creel permits the full run without the necessity of end tying and practically eliminates all down-time. Speeds from 200 to 400 yards per minute are regularly obtained, and the mill superintendent asserted that speeds over twice this figure could be consistently main-



To Serve Industry Better—

Dow's superior service assures you of *dependable* caustic soda delivery, so necessary to steady production.

Dow produces caustic soda in three plants—in Michigan, Texas and California. Dow maintains caustic soda solution bulk tank distributing terminals in Carteret, New Jersey and Charleston, So. Carolina. In addition, Dow ships caustic soda Solid, Flake, and Ground Flake from terminals in Chicago, Illinois, Port Newark, New Jersey, and Charleston.

By tank and box car, truck and ship, Dow caustic soda reaches your plant on schedule.

THE DOW CHEMICAL COMPANY • MIDLAND, MICHIGAN

New York • Boston • Philadelphia • Washington • Atlanta • Cleveland • Detroit • Chicago • St. Louis • Houston
San Francisco • Los Angeles • Seattle

Dow Chemical of Canada, Limited, Toronto 1, Canada

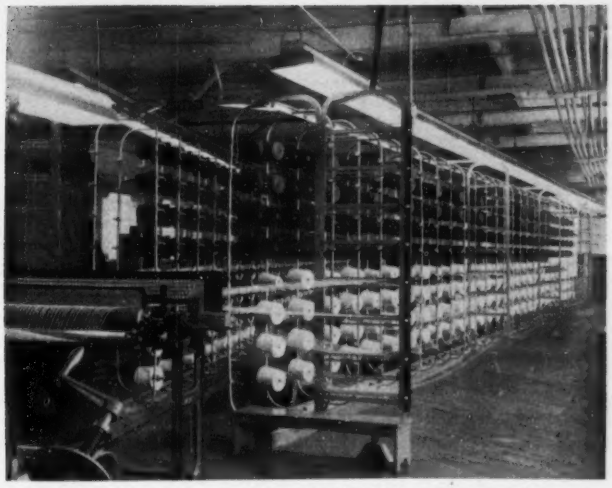
wherever you are... you're close to

DOW CAUSTIC SODA

DOW

CHEMICALS

INDISPENSABLE TO INDUSTRY AND AGRICULTURE



THE MAGAZINE feature of the McBride SRM magazine creel permits a complete change of the new pattern on the creel while the preceding pattern is being run.

tained with lighter yarns.

The magazine feature of the McBride creel permits a complete change of the new pattern on the creel while the preceding pattern is being run. A special revolving spindle helps speed the tying of transfer tails to the new packages, thus further increasing the efficiency of this creel and permitting still faster creel changes. Almost no time is lost in making a pattern change on this creel; therefore it is equally satisfactory for frequent pattern changes and for long runs of single pattern.

Case 56

Knitting Mill Modernizes Extractor with Fluid Drive Coupling

MODERN extractors are designed and built to carry their loads without abuse to their driving mechanisms and motors. However, there are many extractors in finishing plants of knitting and other types of textile mills today that are rather obsolete and were not designed to carry such loads. As a result, breakdowns are frequent and repair costs climb.

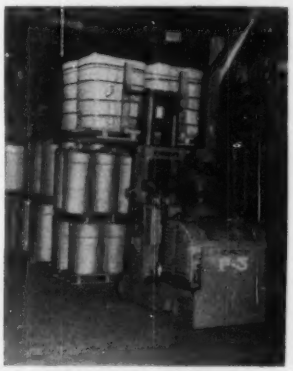
A Georgia seamless hosiery mill has modernized its old extractors by equipping them with fluid drive couplings manufactured by American Fluid Drive Corp. These units are attached directly to the motor spindles. Multiple V-belts convey the power from the fluid drive pulleys to the extractor shaft pulleys.

Advantages to be derived from this arrangement are: Motors are not abused when starting load is applied; upkeep of fluid drive unit is negligible; cost per unit is low in proportion to benefits received; installation is easily accomplished.

Case 57

Finishing Plant Cuts Handling Cost with Fork Trucks

AT THE American Finishing Co.'s Memphis, Tenn., plant 8 to 10 million yards of cotton cloth are bleached, dyed, printed, mercerized, or Sanforized every month, working 24 hours a day 5½ days a week. This is one of the largest and most efficiently operated finishing plants in the United States, it is claimed.



TRUCKS make more effective the use of available storage areas. Six rolls are stacked vertically on a pallet tiered three-high. Now 54 rolls are stored in a floor area formerly occupied by only 15.

Power trucks are used for the rapid, repetitious handling of heavy loads of raw materials and finished products which would be too hard or difficult for manual

Textile Industries Presents

MODERN PRODUCTION METHODS

SAVE LABOR
REDUCE WASTE
SIMPLIFY JOBS
IMPROVE QUALITY
INCREASE PRODUCTION

labor. Although the need for some manual labor always exists here as elsewhere, efforts are made to reduce manual operations, and methods are simplified where possible.

Mechanized material handling is done with six standard Elwell-Parker fork lift trucks. The first of these was purchased four years ago. These trucks are operated 24 hours a day on three shifts. A system of inspection keeps them on the job at times the plant is in operation. Two are serviced each week-end, each truck thus being serviced every three weeks. On week-ends the engineering department uses some of them for maintenance and repair work on processing equipment.

Fork trucks are especially useful where heavy loads can be handled either on pallets or bare forks. Tons of supplies including dyes, starches, and paper in large rolls and flat-stock bundles, are trucked between plant departments, warehouses, and freight cars. Now tonnage handling costs are measured in cents instead of dollars, and total plant output per man-hour has shown a remarkable rise.

A significant fact is that where heavy handling is part of manufacturing, warehousing, and shipping, power trucks are regarded by employees as desirable equipment. Here there is always a waiting list of applicants to operate the trucks. A successful applicant must have been employed five years; consequently, the equipment is always in the hands of skilled men.

Case 58

Nylon Bolsters on Spinning Frames Minimize Sludge Formation

NYLON bolsters have been operating satisfactorily on spinning spindles since May 1949 at Pepperell Manufacturing Company, Pepperell, Ala. Before installing the nylon bolsters, the bases were thoroughly cleaned to remove all sludge. After running for eighteen months, the oil is still completely clear and free from sludge. Instead of oiling weekly (metal bolsters oiled weekly), the nylon bolsters are oiled every eight weeks.

The bolsters are in service on filling spindles operating at 6900 rpm. There is no apparent wear on these bolsters to date, but they have not been in operation for sufficient time to determine their useful life. Although only one frame has been running with these bolsters since 1949, other frames have been equipped for experimental purposes.

Examining a nylon bolster at Pepperell's Alabama plant.

Case 59

Loom Cleaning Costs Reduced

A RAYON weaving mill in the South has, by a change in materials used, reduced the cost of its loom cleaning operation (that is, removing lint, dirt, oil, grease, etc.) and is troubled no more with rust spots on the loom parts after cleaning.

Formerly a full-strength hydrocarbon solvent was brushed on the loom parts, allowed to stand for a certain period of time so that it might soak into the grease, etc., and then wiped off.

Now a solution of one part Oakite

A A P

gives you **all around fastness**

in **Amanthrene*** **BROWN RRD**

A VAT COLOR in paste or double powder form

BETTER FASTNESS Fast to washing, chlorine or peroxide bleaching, soda boiling, sunlight, perspiration, dry cleaning.

BETTER PRINTING Unsurpassed for *printing* of cotton and rayon sports wear, draperies, slipcover fabrics . . . affording the advantages of a homogeneous, *non-drying* paste, or a finely divided dispersible powder.

FINER SHADES Gives a full chocolate shade of brown and, in combinations, meets your precise requirements in blotch work and finer engravings.

WELL WORTH TRYING A.A.P. representatives are ready to show you in your own plant how this superior vat color and others of the Amanthrene range can assure you of finer, faster colors. For a demonstration and individualized data, consult our nearest branch.

AMERICAN ANILINE PRODUCTS, INC.

50 Union Square, New York, N. Y.
Plant: Lock Haven, Pa.
Branches: Boston, Mass. • Providence, R. I.
Philadelphia, Pa. • Charlotte, N. C.
Chicago, Ill. • Los Angeles, Cal.
Chattanooga, Tenn.
Dominion Anilines & Chemicals, Ltd.
Toronto, Canada • Montreal, Canada

*Reg. U. S. Pat. Off.

they are opening up new accounts

"News of beautiful stocking fabrics travels fast. And they can meet the demand because they're getting 15 or more dozen pairs every 8 hours with those new Reading Machines."

• • •

The new "Reading" Machines are producing full-fashioned stockings of superior quality and at higher speeds than ever before possible. Many exclusive "Reading" features give higher precision in operation and greatly simplified control . . . 30 sections . . . 51 and 60 gauge.

TEXTILE MACHINE WORKS • READING, PENNA.

The "READING"
Full-Fashioned Knitting Machine

Composition No. 99 (an emulsion type cleaner) and 20 parts water is brushed on the looms and hand wiped. Cost of the cleaning operation has been reduced by 7½ cents per gallon of cleaning solution used.

Textile Industries Presents

SAVE LABOR
REDUCE WASTE
SIMPLIFY JOBS
IMPROVE QUALITY
INCREASE PRODUCTION

MODERN PRODUCTION METHODS

Case 60

Slasher Moisture Controls Eliminate Necessity for Overtime Operation

INSTALLATION of Barber-Colman moisture content control equipment increased production to the point where two overtime hours on each shift could be eliminated at the Golden Belt Manufacturing Co., Durham, N. C. Before moisture content control equipment was installed, this mill was running two 10-hour shifts per day. Now that the controls are in operation, the mill is running two 8-hour shifts per day.

At the Crystal Springs Bleachery, Chickamauga, Ga., three moisture content control systems were installed and enabled the mill to change from three 8-hour shifts a day to two 9-hour shifts. Substantial savings were made possible by installing this modern equipment.

Slasher output has been increased one-third through use of Barber-Colman moisture content control equipment at Grace Cotton Mill, Rutherfordton, N. C.

Over-drying can cause shedding, fiber damage, warp breakage in the loom, and deterioration of size. Under-drying not only threatens mildew of stored goods, but also means low efficiency and low economy slasher operation. The installations of Barber-Colman instruments and equipment accurately control the moisture content of the warp leaving the slasher and provide a continuous indication and a permanent chart record of slasher operation. Accurate control of warps at the slasher reduces the need for high relative humidity in the weave room.

Case 61

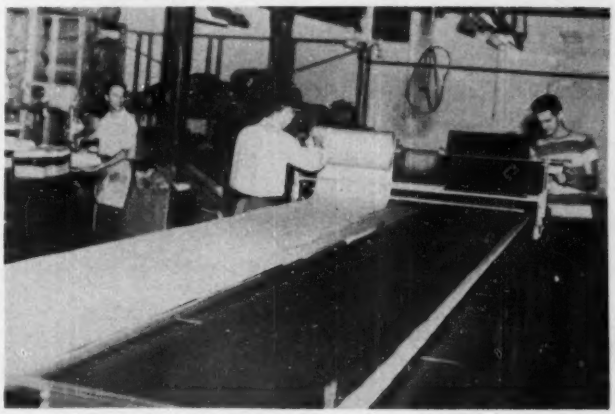
Card Mote Door Saves Time

ALL OF the cards at Spray (N. C.) Cotton Mills were originally equipped with the standard type of mote compartment door, which is actually only a plate set in the back of the card. The removal and replacement of this door is quite awkward and time consuming due

Case 62

Alignment Jigs Switched To Allow Double Spreading

THE CONVENTIONAL two-bolt cloth spreader comes equipped with both alignment jigs on the same side of the machine. At Summit Mills Corp., Philmont, N. Y., one of the jigs was reversed to the other side of a Morrison spreader. In this manner, two men can lay 20″ tubular knit goods simultaneously, as shown, aligning the face to within ¼″. Speeding up the cloth spreading on Summit's cutting tables has eased a bottleneck by doubling the capacity of a table.



The Textile Shops

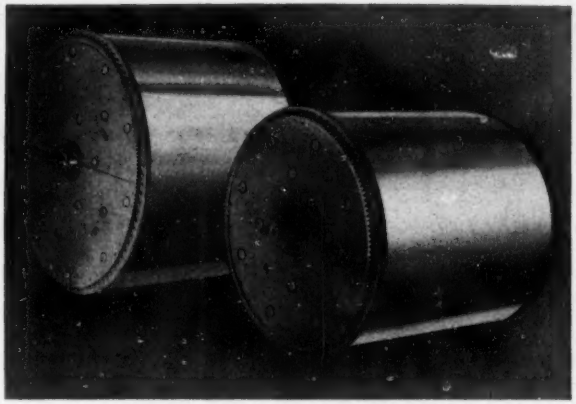
Designers and Manufacturers Textile Metal Products

SPARTANBURG, S. C. Phone 3-6356

Slasher Cylinders

The Textile Shop's long experience in building new and repairing old slasher cylinders makes it the South's most dependable source for this type equipment. Our cylinders can be furnished with stainless steel or copper shells. An exchange service is operated for your convenience—there is no extra charge for this service. Write or phone for details.

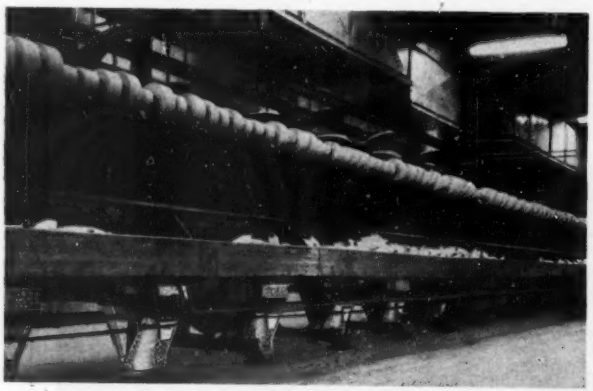
We modernize slasher units by installing the third cylinder, whereby the drying capacity of slashers is increased from 15% to 75%. No additional floor space is required by this installation.



Patented Vacuum Cleaning Systems
for
Automatic Spoolers, Nappers, Warpers

(Patents Nos. 2057139, 2140420, 2120888, 2125774, 20917)

This is the only patented cleaning system that collects lint, fly and dust from supply boxes, bobbin pockets, sneak plates and rotating cheeses. The fly is collected by hoppers and conveyed through filters, whence the cleaned air is re-circulated.



This system is installed on thousands of spindles in the North and South. Some of the results achieved are:

1. 93% Lint and Dust Collected.
2. 20% Less Cloth Room Seconds.
3. Less Gouts in Yarn.
4. Fewer Loom Stops.
5. No Stops for Cleaning.
6. Less Shed in Weave Room.
7. A Better Product.
8. Better Working Conditions in the Mill.
9. Less Machinery Wear.
10. Increased Production.
11. Less Operative Cost.

(Letters in Our File)

(Pays over 20% on Investment)

12. *Maximum Cleaning with Minimum H. P.*

PRODUCTS AND SERVICES OF THE TEXTILE SHOP

ACID TANKS
AIR CONDITIONING
AIR WASHERS
BALL BEARING JOURNAL HOUSING UNITS
BLEACHING TANKS AND TUBS
CARD SCREENS
  Repaired, New
CARD SCREEN BARS AND RIBS
CARD SCREEN LICKERINS FOR COTTON AND RAYON
CHEMICAL TANKS
CONDENSERS
CONDENSER SCREENS
CONVEYORS
  Pipes and Returns
COPPERSMITHING
COWL VENTILATORS
CYLINDERS
  Spinning
  Spooling
  Twisting
DRIP PANS
DYE KETTLES AND VATS
  Relining with Copper or Stainless Steel
FILTERS
IMMERSION ROLLS
PICKER SCREENS
  Perforated Metal
  English Wire Cloth
  Galvanized Wire
PNEUMATIC CONVEYING SYSTEMS
QUILL CANS
SIZE ROLLS
SQUEEZE ROLLS, etc.
VALVES FOR SLASHERS
WASTE SCREENS

to the fact that so many precise movements are necessary in either operation.

Hinges and counter-balanced doors have been installed on all of the cards. Two hinges are located at the bottom of the door and a weight on each end of the door. The weights are extended inward on an arm so as to balance the weight of the door when it is shut.

To open the door, simply pull it open a few inches and let it drop to the floor. To close, raise the door (with the foot if desired) until it falls closed. The weights will hold the door open or closed, depending upon which side of the pivot point they are on.

Even though this is a small operation, due to the number of times it is done, there is an amazing amount of time saved—approximately 15% of the total time required to take out motes with conventional arrangement can be saved by use of these doors. Very little material is necessary to make this change, and it can be done in the plant shop. It is well worth the initial expenditure of time, money, and effort, according to the mill officials.

Case 63

Spinning Ring Lubrication Improved by Installing Centralized System

FAR SURPASSING older methods of oiling is the centralized lubrication system installed on twelve 114-spindle Whitin Model E spinning frames at Carleton Woolen Mills, Inc., Rochdale, Mass., according to the management of this plant.

Wool frames are equipped with a Lincoln Centro-Matic System which is admittedly more complex than the "oil can," but remarkably more efficient. Core of the system are the SL-3 injectors located at the rail behind each ring. These are precision machined units and consist of only two moving parts: a valve stem and piston. Discharge of injectors is effected by positive displacement.

A knurled adjusting knob may be turned to the proper setting by hand in order to provide accurately metered delivery of oil. Maximum lubricant output of an injector is .004 oz per cycle. At Carleton, injectors are set for one drop per cycle (approximately .0009 oz). A spring clip-lock prevents changes in setting due to vibration.

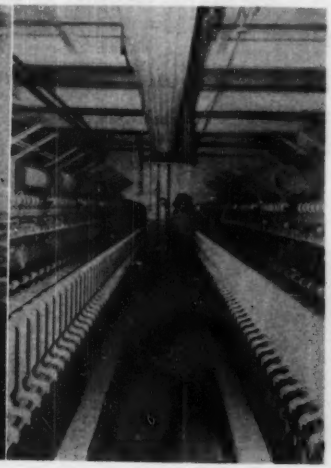
The injectors are impulsed by line pressure developed by a fully automatic air-motor operated drum pump. Frequency of delivery is predetermined at an adjustable one hour cycle time clock control. About 2500 psi pressure is required to deliver the necessary amount of lubricant for the 1728 rings affected in the circuit.

In this system, oil is never transferred from one container to another. At final point of applica-

A HIGH pressure quarter turn valve provides means for shunting lubricant during repair work.

PUMP and drum head are lifted off empty 55-gallon drum during replenishment of oil supply.

IMMACULATE condition of floors and machinery attests to the orderly efficiency of the system.



DO YOU MAKE SANFORIZED FABRICS?

Try These 4 SEYCO Processing Assistants for Uniformity, Excellent Absorbency

SEYCOL S —All purpose Fabric Oil balanced blend of rewetting agent with efficient softener.

SEYCOPEN 49 —Highly effective rewetting agent for producing maximum absorbency where soft hand is not important.

SEYCOL RW —Use where a very soft hand is the primary aim. Contains ample rewetter for necessary absorbency.

SEYCOSOL 100—Extra quality; for use where best possible results on fine counts and bleached goods are more important than a few cents extra cost.

HEADQUARTERS FOR TEXTILE CHEMICALS

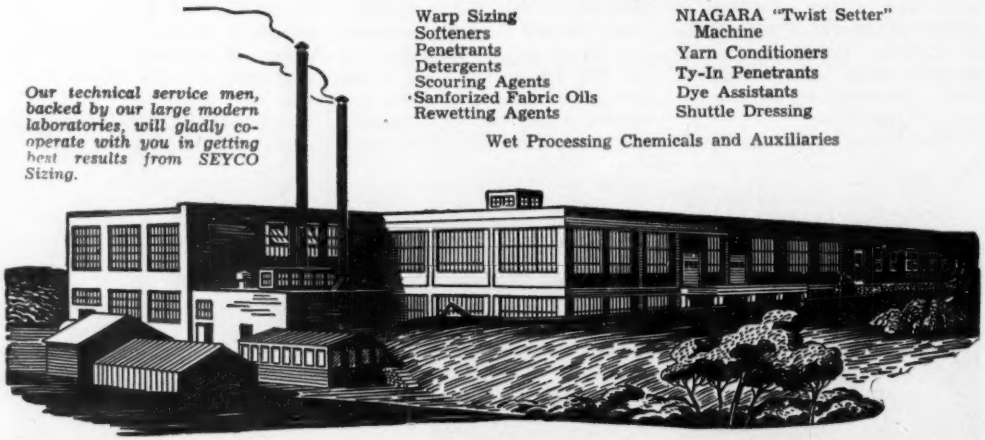
SEYCO Products

Warp Sizing
Softeners
Penetrants
Detergents
Scouring Agents
Sanforized Fabric Oils
Rewetting Agents

NIAGARA "Twist Setter" Machine
Yarn Conditioners
Ty-In Penetrants
Dye Assistants
Shuttle Dressing

Wet Processing Chemicals and Auxiliaries

Our technical service men, backed by our large modern laboratories, will gladly cooperate with you in getting best results from SEYCO Sizing.



SEYDEL-WOOLLEY & CO.
TEXTILE CHEMICALS
748 RICE STREET • ATLANTA, GA.

PENETRANTS • SIZING • SHUTTLE DRESSING • SOFTENERS • ALKALIS • TWIST SETTER MACHINES •

SEYCO

Close-up view of rail, showing injectors mounted behind spindle on inside of rail.

clean. Higher percentages of soft and hard waste are salvageable. Driving tapes and whorls are also oil free, thus permitting higher spindle speeds and higher production in the absence of tape slippage.

Not to be ignored either is the improved quality of finished goods which stems from such a well-controlled lubrication system. Dirt specks, once caused by oil-saturated dirt dropping from adjacent areas onto the spinning yarn, are naturally avoided. Ends down at the spindle have also been minimized.

Perhaps the greatest single advantage of centralized lubrication at the Carleton plant, is the abrupt decline of down-time for oiling and other associated activities such as cleaning and repairs. Management estimates from the weekly production records that the spinning frames are in operation more than 90% of the total possible running time, based on a three-shift schedule.

A drum of grease will supply the system for more than eight weeks. In the same period of time, with the hand oiling procedure formerly employed, two drums of oil would have been required. Cost of the oil and grease is comparable; thus a saving is effected in this respect.

The mill finds the system maintenance free. It requires the services of only one man, part-time.

Cost of the installation, including the labor to put it in operation, was reported to be approximately $4.10 per spindle.

tion, the oil remains refinery pure. When a drum is emptied, the pump and drum cover assembly is hoisted by pulley until a new 55 gallon drum is switched in place. Spillage waste and adulteration of oil are entirely eliminated.

Reliable, uniform lubrication assured by this mechanical technique is cutting traveler replacement to a minimum. Life expectancy of travelers has more than doubled, and it is expected that rings will last longer too.

Much of the gummy oiliness of floors and frame components which plagued operatives during the "oil can" era came from the ballooning action of yarn between guide and traveler. As oil was applied to the rails, it was drawn into the vacuum created by the rapidly whirling yarn and then expelled as a vapor. This oil fog, deposited as a tenacious film, was difficult to remove and a trap for dust and fly. Eventually, this viscous foreign matter penetrated into bearings. Normal lubrication was interfered with, and abnormal stresses, worn shafts and other moving parts were the result of inadequate lubrication.

Floors are now immaculately

Case 64

Steam-Regulating Controls Improve Slasher Operation

A TYPE of moisture controller by which the steam pressure in the slasher cylinders is varied while the speed of the yarn remains constant, has given good results at Startex (S. C.) Mill, over a period of almost two years.

In modernizing the slasher room, the management at Startex was convinced that there were definite advantages to maintaining a constant slasher speed and varying the temperature as required to maintain a constant moisture regain. With constant speed, it is possible to plan production schedules more closely, and optimum speeds can be run as determined by the set being sized. Furthermore, there is less danger of end breakage as the result of sudden speed changes.

With these advantages in mind, Startex installed on its three slashers a Brown constant speed control system actuated by an electronic Moist-O-Graph. When the Moist-O-Graph indicates the yarn is coming off too wet, a pressure controller permits an increase in steam pressure which results in increased temperature. Conversely, when the yarn comes off too dry, steam pressure is reduced. Changes in pressure show up in adjustment in regain with reasonable speed, and the slashers have been able to hold regain to within ± ⅛ of one per cent. It is seldom that regain varies more than ½ of one per cent above or below the desired 7½ per cent.

When the controls were installed, the three West Point Foundry & Machine Co. slashers were converted from two to three

Colors *custom-made* for nylon

NEW DU PONT NEUTRACYL DYES are neutral dyeing colors—designed specifically to produce the *highest possible light fastness on nylon.*

They can be applied in the same short time cycle as acid colors . . . but have decidedly superior light and wet fastness on filament nylon. For example, Neutracyl Blue G is especially recommended for dyeing nylon staple. The dyed staple can be converted into those fabrics which require superior light fastness—such as upholstery materials, automotive top materials, government fabrics and outer wear.

These NEUTRACYL dyes are suitable for dyeing wool, giving fastness properties similar to nylon.

For information on NEUTRACYL dyes . . . or for help on any coloring problem . . . consult our Technical Staff. E. I. du Pont de Nemours & Co. (Inc.), Dyestuffs Division, Wilmington 98, Delaware.

Du Pont Dyestuffs

DU PONT
REG. U. S. PAT. OFF.

BETTER THINGS FOR BETTER LIVING . . . *THROUGH CHEMISTRY*

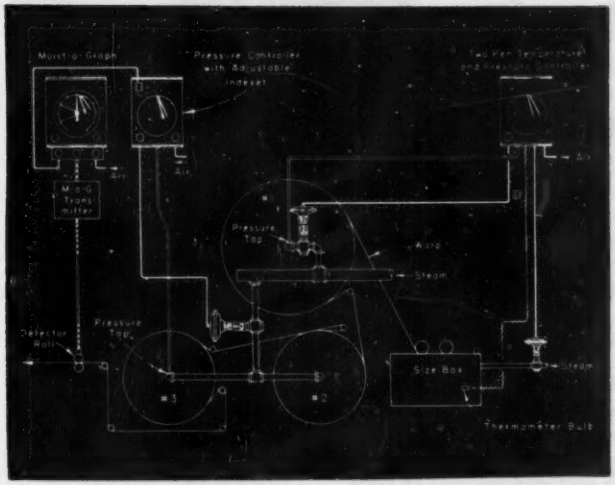


Diagram showing installation of Brown Moist-O-Graph controls on slasher. This is similar to arrangement at Startex.

cylinders. Steam pressure at the first cylinder is not varied but is maintained at about 4 psi. Steam pressure on the two front cylinders is varied by a pressure controller directed by the Moist-O-Graph. This steam pressure may be varied from 0 to 15 psi.

According to W. M. Allison, general superintendent, the entire system is one of quality control. It maintains moisture content within closer limits by its constant balance feature, locking in the related variables to yield a better degree of control at reduced cost and without the equipment wear associated with fluctuating speed.

Case 65

Single Instrument Records Dewpoint at Five Locations in Mill

CONSIDERABLE time and, therefore, considerable operating cost have been saved by the installation of a Multi-Record Dynalog, manufactured by The Foxboro Company, in the air conditioning compressor room of the Hudson Hosiery Co., Charlotte, N. C. This recording instrument makes a continuous record which shows the dew point at five locations in the mill and in addition, records the outside wet bulb temperature. Only one chart is used, but the five inside and one outside readings are each printed in a different colored ink. Only one pen is used in the instrument, but it is so arranged that the pen picks up a new point every two or three seconds and with that point makes a dot in the appropriate color, thereby recording the dew point at the corresponding station.

By having on one chart data showing dew points (which can be converted to relative humidity when room temperature is known) throughout the mill, it is easily possible for the air conditioning engineer to know not only when something has gone wrong, but where the trouble is located. H. L. Cartee, air conditioning engineer for Hudson, says that this instrument has saved him time, trouble, and expense in showing him where to look for trouble and in providing him with a record of temperature and relative humidity in each of the five major departments in the mill in which the condition of the air is important.

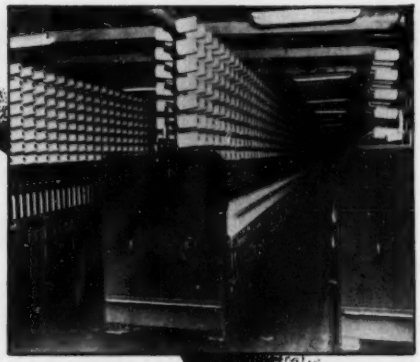
Case 66

Radiant Burners Improve Efficiency in Drying Operation

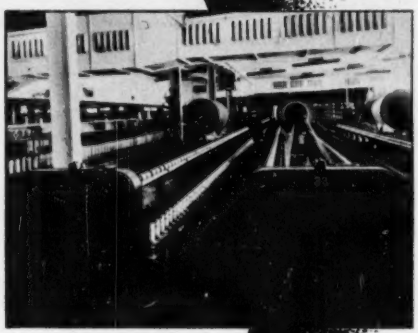
A FOUR-BURNER heating system furnished by Process Heating, Inc., was recently installed in a large plant in Caracas, Venezuela. Now wet goods are passed over the tenter frame once and at a faster speed than any of the three passes formerly required. The dry box and steam can operations in this drying process have been eliminated entirely.

The change has permitted an increase in production and established a considerable saving in la-

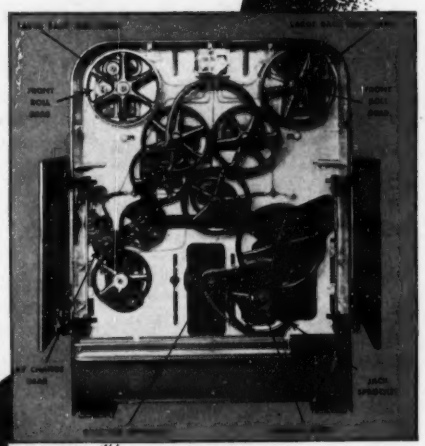
Why Mills Prefer
H&B TWISTERS



PACKAGE TWISTER



BEAM TWISTER



HEAD END

H & B Twisters are built ruggedly — and exactly — to exact specifications for producing high quality finished yarn with an even twist.

They deliver a firm, well-shaped package, carrying the maximum yardage permissible within the natural limits imposed by traverse and ring diameter. Whether the yarn is twisted for duck, top quality broadcloths, gabardines or sewing thread, you can count on the final quality of the twisted yarn, as well as the safety, ease and economy of operation of the machine. Among the many features that assure trouble-free run-off in subsequent yarn operations are:

1. *The ball bearing thrust washer in the builder drive that prevents dwelling at the top and bottom of the stroke and particularly aids high-speed winding.*
2. *Wet twisters are equipped with an automatic water feed control that maintains the same level in troughs, assuring even water penetration.*
3. *Replaceable bottom roll bearings to reduce maintenance cost.*

Supply packages on H & B Twisters can be beams as well as cones or tubes. Beam stands have ball bearings and a brake assembly which assures uniform and even tension let-off. Superstructure can have one or more beams. The shift to single beam operation is accomplished by moving one set of beam stands to the center position.

These and other additional efficiency features are why, when running yarn for tire cord, where perfect twist is required — most mills prefer H & B Beam Twisters.

HEAD END FEATURES:

1. *All cut gears throughout.*
2. *Silent chain drive from cylinder to jack shaft.*
3. *Electric stop motion prevents starting of machine when doors are open.*
4. *Bijur lubrication system.*
5. *Doors swing open and away, making head end easily accessible for gear changes.*

Ask to have an H & B Sales Representative call with the complete story of H & B quality twisting. Contact the main or a branch office — today.

H&B AMERICAN MACHINE CO.

FACTORY, EXECUTIVE OFFICES AND EXPORT DIVISION • PAWTUCKET, R. I., U. S. A.
Branch Offices: Atlanta, Ga. — 815 Citizens and Southern National Bank Bldg.
Charlotte, N. C. — 523 West 4th Street
Greenville, S. C. — 1510-11 Woodside Bldg.

Builders of MODERN TEXTILE MACHINERY

bor, in addition to providing a better "hand" to the fabric.

A saving in fuel has been effected in that the equipment is only used as needed, instead of keeping a loop dryer, a set of cans, and two coils under the frame up to heat. Now there is less heat loss to the room, and working conditions are more comfortable. It is estimated that the installation will pay for itself in a matter of months.

The radiant burners now in use are equipped with an oil-to-gas converter, utilizing No. 1 or No. 2 fuel oil.

Before installing the new system, the Caracas plant ran the cloth through a steam heated loop dryer, over a set of steam cans, and three times over a tenter frame under which there were two large sets of steam coils. The four-burner Process heating system was substituted for the steam coils.

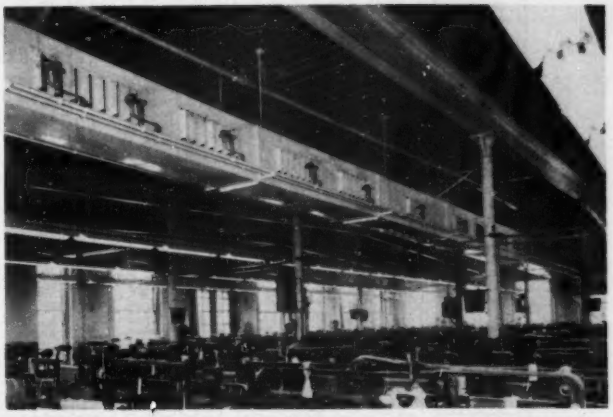
Case 67

New Humidifiers Give Good Results

SAGAMORE Manufacturing Company, Fall River, Massachusetts, after seeing and recording the performance of Gradumatic humidifiers and Airchangers in three small weave rooms, is installing a total of 43 units furnished by Parks-Cramer Co.

The combination of Gradumatics and Airchangers gives good results in that Gradumatics increase or decrease their output automatically in accordance with room demands. Automatic Airchangers insure maximum evaporative cooling and excellent uniformity in humidity and temperature.

This Gradumatic system is basically new. The humidifiers operate with both air and water under pressure—water pressure always less than air pressure. Both pressures are controlled gradually by the Certified Climate Psychrostat. One size Gradumatic gives outputs varying from 2 to 16 pounds per hour. Adjustment is unnecessary for continual operation at maximum efficiency, and the units are self-cleaning.



Self-cleaning Gradumatic humidifiers and Airchangers have good performance record at Sagamore Manufacturing Co.

Case 68

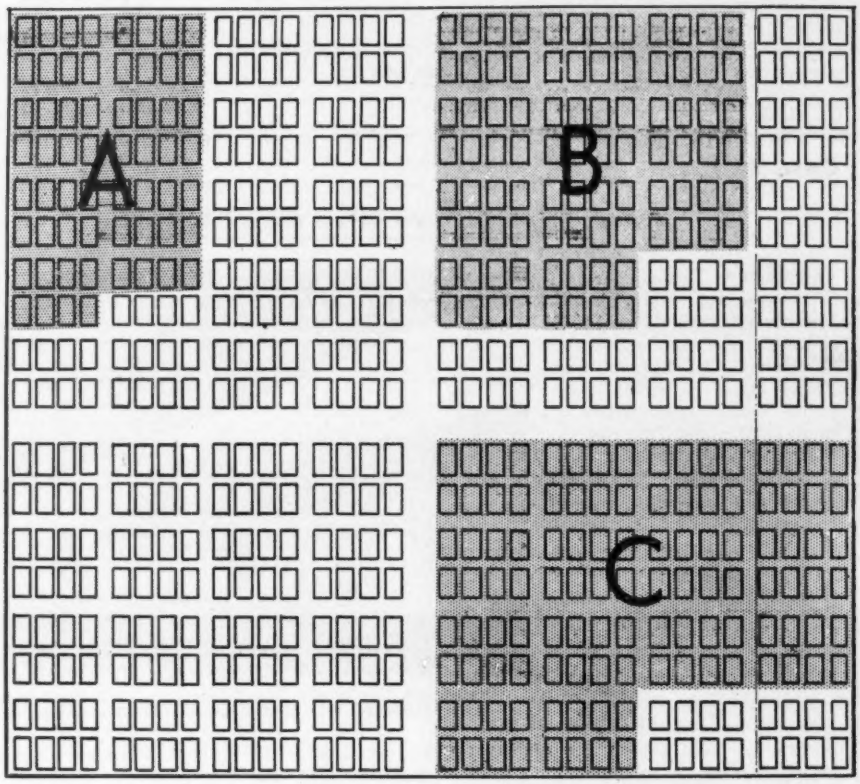
Bad Work in Card Room Decreased by Installing Overhead Cleaners

BEFORE overhead cleaning equipment was installed in the card rooms at a large southern mill, one operative blew the ceiling off with an air hose twice a week. In using the air hose, all of the lint that accumulated on the ceiling was blown down at one time and dropped onto the cards, drawing frames, and fly frames. This condition caused a large amount of bad work, and some of this bad work went to the spinning room, thereby causing an excessive number of ends down on the spinning frames. Also, the blow down man caused a great many ends down throughout the card room.

Recently an overhead cleaning system was installed in the card rooms and the results have been pleasing to the management at this mill.

3,300 feet of monorail were installed in the two card rooms of this mill to accommodate the overhead cleaners. Immediately after installing the overhead

How many looms do you run to pay for *Waste?*



The number shown in A, B, C, or ??

Your waste loss increases unit cost

and decreases margin of profit

SOUTHEASTERN ENGINEERING COMPANY,

WEST POINT, GEORGIA

WE specialize in waste reduction and waste control methods. The basis of our service is a waste training conference for all levels of supervision.

Our guarantee to you is a savings of at least five times the cost of the program during the first year.

Write for a list of mills using our service – then ask them about us.

SOUTHEASTERN ENGINEERING COMPANY,

WEST POINT, GEORGIA

MEMO

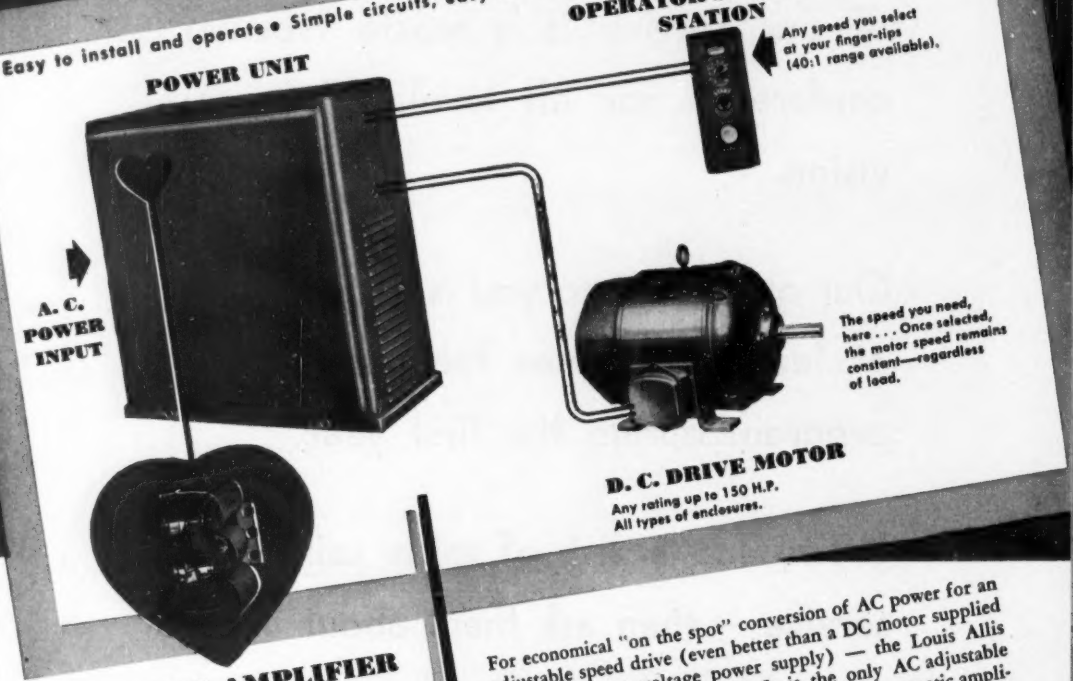
To: users of A.C. adjustable Speed Drives

From: THE LOUIS ALLIS CO.

Only SELECT-A-SPEDE

offers the NEW MAGNETIC AMPLIFIER CONTROL with superior performance at no extra cost!

Easy to install and operate • Simple circuits, easy to maintain • Compact design saves floor space


OPERATOR'S CONTROL STATION
Any speed you select at your finger-tips (40:1 range available).
POWER UNIT
A. C. POWER INPUT
The speed you need, here . . . Once selected, the motor speed remains constant—regardless of load.
D. C. DRIVE MOTOR
Any rating up to 150 H.P.
All types of enclosures.

THE MAGNETIC AMPLIFIER

— HEART OF THE SELECT-A-SPEDE

The Magnetic Amplifier, a self-saturating reactor, like a transformer, contains no moving parts — no parts requiring maintenance or periodic replacement. Its function in the Select-A-Spede, is to constantly regulate the field currents of both motor and generator. It requires no "warm up" period, has an extremely fast response to changing conditions, and is completely reliable at all times.

For economical "on the spot" conversion of AC power for an adjustable speed drive (even better than a DC motor supplied from a constant voltage power supply) — the Louis Allis Select-A-Spede is unsurpassed. It is the only AC adjustable speed drive offering the advantage of the new magnetic amplifier control — with close speed regulation at all rated speeds and loads.

The Select-A-Spede also offers a variety of optional features, such as: reversing, dynamic braking, jogging, sequence control, controlled acceleration, interlocked slow speed start, multi-motor drives, etc. It is possible to provide a Select-A-Spede Drive to exactly suit your special requirements.

For further information, contact your nearest Louis Allis Application Engineer or write for Bulletin 1100-B.

LOUIS ALLIS

THE LOUIS ALLIS CO., MILWAUKEE 7, WIS.

cleaning system some trouble was experienced with ends coming down on the cards, but after setting the travelling fan at different angles, most of the trouble was eliminated. The fan makes one trip around the card room in approximately twenty minutes, and manual overhead cleaning has been greatly curtailed. In addition to decreasing bad work, the overhead cleaning equipment has shown a 13⅓ per cent annual return on the investment.

Textile Industries Presents

SAVE LABOR
REDUCE WASTE
SIMPLIFY JOBS
IMPROVE QUALITY
INCREASE PRODUCTION

MODERN PRODUCTION METHODS

Case 69

Warp Spinning Efficiency Improves with Synthetic Yarn Carriers

LONG LIFE, no vibration of bobbins at tops of spindles, fewer ends down, and lower initial cost are advantages cited by operating executives of a Georgia cotton mill for American Paper Tube Company's "Plasti-Weld" spinning frame bobbins—a synthetic type of yarn carrier that employs in its construction laminated fibrous material, metal, and plastic.

These bobbins are being used in this instance on new Saco-Lowell spinning frames fitted with the Shaw drafting system and New Era spindles with adapters. Ring size is 2⅜ inches; yarn count, 20s warp.

The patented Plasti-Weld method of bobbin manufacture is described as a permanent welding together of the components by plastic molding under heat and pressure, resulting in the production of a yarn carrier that is truly a unit. The thermosetting molding process locks the plastic to the tube in such a manner that it can never be loosened or removed without smashing the bobbin, the manufacturer claims. The same is true of metal parts included for protection of the bobbin.

The seat is molded into the tube under heat and pressure, assuring true roundness and true concentricity with the axis of the bobbin because the tube is indexed into the mold within .001". In addition, perfect alignment is obtained on the spinning frame because the seat is molded an exact distance from the base of the bobbin.

Case 70

Warp Yarn Waste Minimized by Using Special Textile Tape

A NEW ENGLAND mill has achieved an annual saving of $8,000 by using a specially developed textile tape to hold warp threads in place during part of the processing.

Based on the production of 100 looms each working day, the dollar savings are due to an average raw material saving of approximately ½-pound (.463) of warp thread per beam per loom, the mill's engineers pointed out.

"Two strips of textile tape," they explained, "are responsible for this raw material saving, while the savings in reduced machine and labor time are even higher."

The tape, "Scotch" brand Textile Tape No. 280, made by Minne-

Case 71

Machine Cleaning Simplified

MILL TESTS over long periods of time have shown that Jarrett's Meta-Clean cuts the time required to remove lint, grease, oil, and dirt from textile machinery. One mill reports that it cleaned a loom in one-seventh the time formerly needed.

Jarrett's Meta-Clean is odorless, non-inflammable, does not irritate the skin, and is effective when diluted with 20 parts of water. In the illustration, Meta-Clean is being sprayed onto a loom. It can also be brushed on, mopped on, and small parts can be immersed in the solution.

PRODUCTION PROBLEMS

got you up a tree?

● The function of our Technical Service Department is to help solve various production problems in the field. These men are constantly working with new products and techniques—perhaps this experience would be helpful in smoothing out production sore spots in your operation.

Our basic, continuing research in starch chemistry is unsurpassed . . . under the direction of the foremost research men in this field.

Make the most of these facilities . . . no obligation, of course.

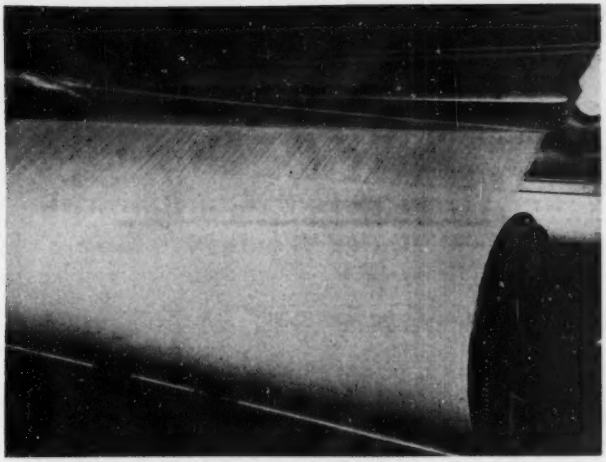
For uniform quality products . . . for a reliable source of supply . . . depend on Corn Products Refining Company.

Globe and Eagle are registered trade-marks of Corn Products Refining Company, New York, N. Y.

write to

CORN PRODUCTS REFINING CO.

17 Battery Place, New York 4, N. Y.



After the necessary yardage of warp threads has been wound onto the loom beam, the threads are held in position by two strips of tape.

sota Mining and Manufacturing Co., is one of four "general duty" type tapes being used in textile mills today.

At the New England mill, the tape comes into use after the necessary yardage of warp threads has been wound onto the loom beam. The threads are then sandwiched between two strips of the tape, to be held in position for cutting and subsequent transfer to the loom.

Other mills have reported similar savings made possible through the use of textile tapes. Cited are: The tape's ease of application; instant adhesion of the tape to threads; accurate, positive holding of the threads in their proper position; and no mess or oozing of adhesive to the next layer of threads.

Case 72

Improved Yarn Quality Attributed to Ball Bearing Top Rolls

A MILL REPORT, dated Oct. 27, 1950, showing benefits from the use of Climax ball bearing top rolls on 20,000 spindles is summarized as follows:

Roll picking reduced 82%.

Elimination of lubricating labor and cost of lubricant.

Elimination from yarn of oil stains due to roll lubricant.

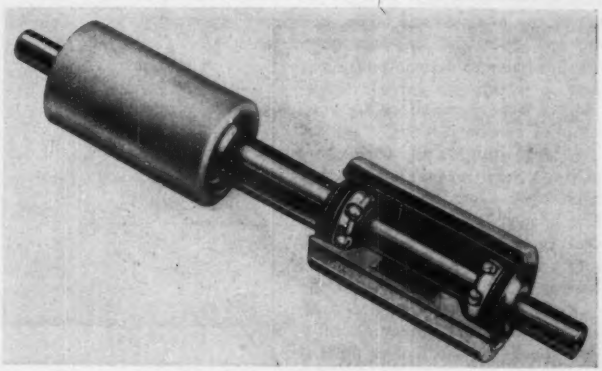
On 22s cotton yarn, 8.72% improvement in deviation and 7.0% improvement in break factor, as compared with conventional rolls. (Another recent mill test showed a reduction of 40.9% of the variation in size of yarn produced, and an increase of 15.4% in breaking strength.)

Roll slippage eliminated, as compared with slippage up to 48.8 yards per hour using conventional rolls (results of stroboscope tests).

Other advantages were received but not measured: for example, less eyebrowing, reduced power consumption, savings in down-time for oiling and picking, cleaner condition of rolls.

Each mill of the 400-plus mills using Climax rolls emphasizes the advantages most valuable from the point of view of its particular operation. But, the consensus of

Shown here are construction details of Climax ball bearing rolls.



Textile Industries Presents

MODERN PRODUCTION METHODS

SAVE LABOR
REDUCE WASTE
SIMPLIFY JOBS
IMPROVE QUALITY
INCREASE PRODUCTION

results from the modern Climax anti-friction top rolls may be summarized as cleaner, more even yarn at definite and immediate cost reductions.

Case 73

Small Cone Winder Useful in Seamless Plant

A SMALL six-spindle Foster cone winder is proving most advantageous in a southern seamless hosiery knitting plant.

Oftentimes the sample department has only two large cones of expensive yarn from which special samples of hosiery are to be made. Four cones are needed for the knitting machine. The answer—make two more cones on a small winder.

Occasionally a lot of yarn on the knitting machines gives an excessive amount of trouble with breakbacks due to knots and slubs. The answer—backwind the yarn on a small winder to determine the extent to which the yarn is defective so that complaints to yarn supplier can be justified.

A large number of small cones of dyed yarn accumulate, having been broken out by the knitters. The answer—take yarn from several small packages and wind it into a large package with a small winder.

A few cones of yarn are damaged in transit to the mill; knitters "peel" yarn off cone until it is untangled and throw yarn into waste can. The answer—the damaged cones are carried to the small winder and straightened out.

Case 74

Fewer Fires, More Production with Single Cylinder Waste Machine

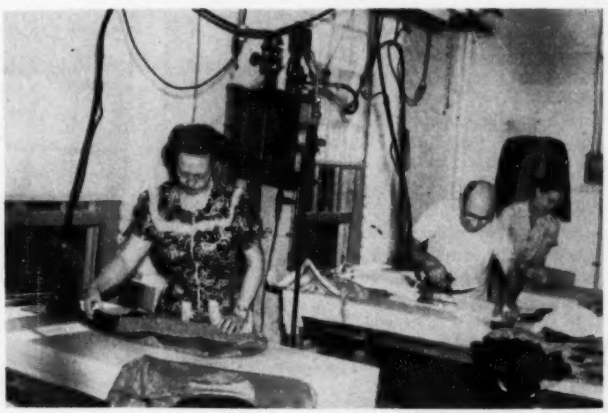
THE WASTE MACHINE is usually one of the most persistent mechanical arsonists in the mill. Certainly this had always been true of the old two-cylinder waste machine which had been in service for many years at Spatex Corp., Charlotte, N. C. Waste collected regularly between the heads of the cylinders and the frame, and it was not uncommon to have three or four fires a day starting in this collected waste. Some were serious and some were not, but the machine presented a constant hazard.

Six months ago the old two-cylinder machine was replaced with a Kirkman & Dixon, single cylinder waste machine, and the results have been remarkable. There has been only one fire in the machine in six months. The machine turns out 50% more than the

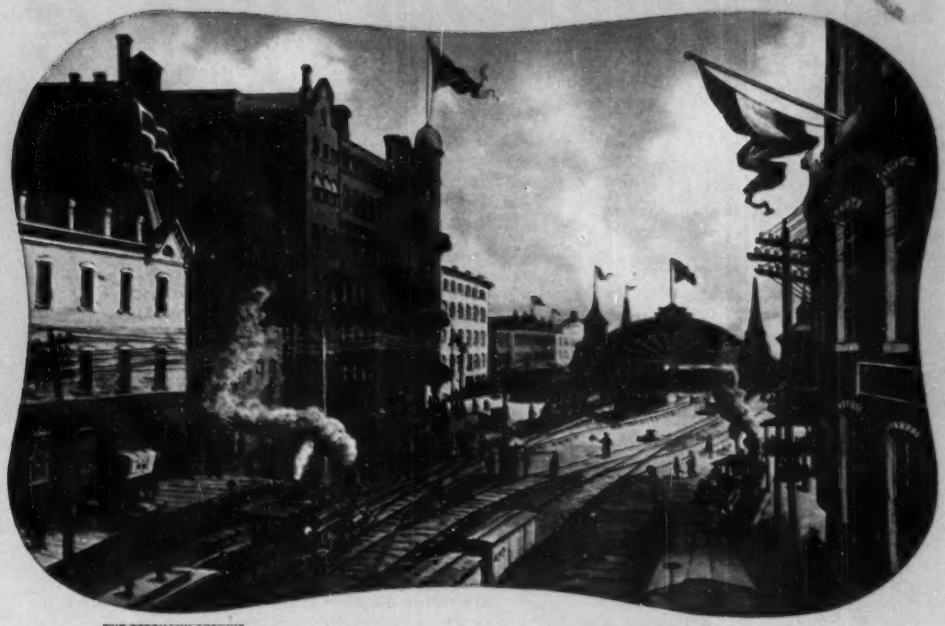
Case 75

Small Electric Boiler Solves Steam Supply Problem

MEASURING only 9¼" dia. by 14½", a wall-mounted electric boiler at Summit Mills Corp., Philmont, N. Y. supplies all the steam required for four irons. Water is at proper temperature within minutes of throwing the switch. Manufactured by Steamaster Co., the boiler is instrumented by Minneapolis-Honeywell Regulator Company.



Rapid railroad expansion is opening east markets to mainline distribution.
THE ISELIN DIARY, 1857



THE BETTMANN ARCHIVE

Shunt to the main trunk...

The "motive power" of business is working capital. Shunting this capital from the sidings of idle receivables to the mainlines of production and distribution has long been Iselin's function . . . Iselin Factoring assures availability of your working capital for productive use, turning receivables to cash and ending credit losses . . . For 141 years, our service has been geared to our clients' needs. It can put *you* on the track to greater profits. Send for booklet on our Factoring service to industry.

William Iselin & Co., Inc.

357 Fourth Avenue, New York 10, N. Y.
200 Keeler Building, Grand Rapids 2, Mich.

FOUNDED IN 1808

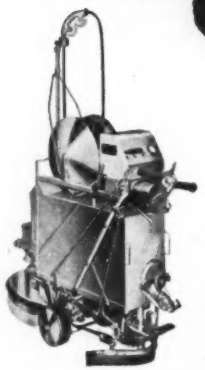
NEW SCRUBBER-VAC

Cuts Cleaning Time 2/3

FOR SMALL-AREA MILLS

- Specially designed for buildings with 2,000 to 15,000 sq. ft. of floor space
- Applies the cleanser, scrubs, rinses, and picks up in ONE operation
- Also handles the dry work — steel-wooling, polishing, et cetera
- Can be leased or purchased (leasing budgets cleaning expense)

● Now the labor-saving advantages of *combination-machine-scrubbing* are available to small as well as larger mills. The *new 418P Finnell Scrubber-Vac,* for small-area buildings with 2,000 to 15,000 sq. ft. of floor space, cleans floors in *approximately one-third the time* required with a conventional 15 or 18-inch scrubber-polisher using separate equipment for picking up. A *Finnell Scrubber-Vac* speeds cleaning by handling four operations in one! It applies the cleanser, scrubs, rinses if required, and picks up (damp-dries the floor) — all in a single operation.



Of narrow design, the *new 418P Scrubber-Vac* also meets the need in larger mills for a combination machine that can be used in congested areas, narrow aisles, and weave room alleys. All the refinements of *Finnell's* larger combination machines are embodied in this smaller unit (18-inch brush ring). Has new type of water valve that *assures* uniform flow of water . . . powerful vacuum for efficient pickup (performs *quietly*) . . . a *Finnell-developed* trouble-free clutch . . . self-winding cable reel . . . improved waterproof wiring and minimum electrical connections, simplifying the cleaning of the machine . . . G. E. Motors and Timken Bearings. The machine is self-propelled — operator merely *guides* it. Supplied with or without powder dispenser. Incidentally, it's good to know that when you choose *Finnell Equipment,* a *Finnell* man is readily available to help train your maintenance operators in its proper use.

SEE IT IN ACTION ON YOUR OWN FLOORS!

Find out what *you* would save with a *Finnell Scrubber-Vac. Finnell* makes several models and sizes. For demonstration, consultation, or literature, phone or write nearest *Finnell Branch* or Finnell System, Inc., 1302 East Street, Elkhart, Indiana. Branch Offices in all principal cities of the United States and Canada.

FINNELL SYSTEM, INC.

Pioneers and Specialists in

FLOOR-MAINTENANCE EQUIPMENT AND SUPPLIES

BRANCHES IN ALL PRINCIPAL CITIES

old one, and there has not, so far, been any money spent on maintenance beyond the cost of lubrication, if that may be classed as preventive maintenance.

The management of the mill is naturally pleased with the machine's performance, and feels that the investment and the selection were both wise.

Textile Industries Presents

SAVE LABOR
REDUCE WASTE
SIMPLIFY JOBS
IMPROVE QUALITY
INCREASE PRODUCTION

MODERN PRODUCTION METHODS

Case 76

Vacuum Cleaner System in Weave Room Effective in Preventing Seconds

TWO electric motor driven turbines create a vacuum equivalent to 28" of mercury to operate the vacuum cleaner system used to clean looms at the Catherine plant of Avondale Mills in Sylacauga, Ala. 250 looms are being cleaned by this system, and management is trying to work out a method of cleaning to save money and prevent seconds.

The vacuum cleaner is effective in preventing seconds caused by soiled lint getting into the work during the cleaning operation. The system was supplied by New England Machine Works, is powerful, and does a good job of cleaning, according to the management at Avondale. In this instance the equipment is being used on an experimental basis.

The two power units are located on the ground floor, and 5" aluminum pipes are arranged along the under side of the weave room floor. All branches into the weave room are 3" outlets spaced at 25' intervals. A 50' flexible aluminum hose is used in the weave room where the operator may move from one outlet to another as he progresses down each row of looms. Several different types of nozzles are employed on the end of the flexible hose, depending upon what part of the loom is being cleaned.

The waste tank, located on the ground floor, is cleaned once each shift, and the waste is weighed to provide a check on increased efficiency in cleaning.

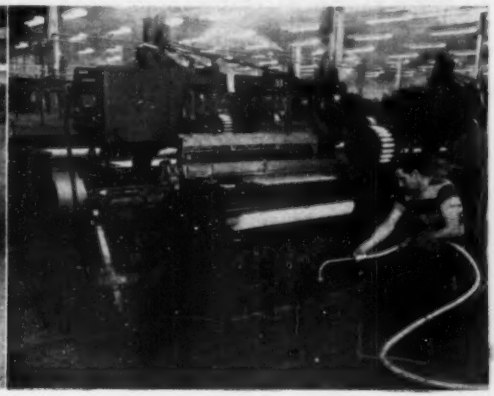
Case 77

Conical Rings Aid Nylon Spinning

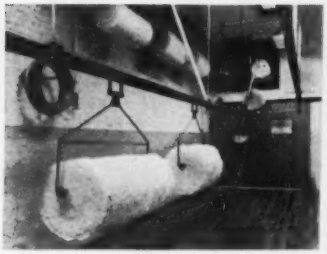
HERR conical rings are used in spinning staple nylon at Newnan Cotton Mills, Newnan, Ga., and results have been most satisfactory because friction on the yarn, traveler, and ring is reduced to a minimum, according to management at this mill. The strength and abrasive characteristics of nylon necessitate special

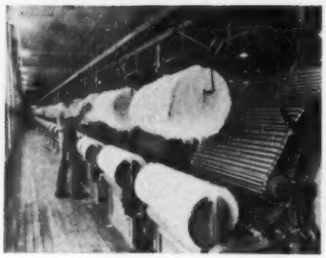
VACUUM producing machinery and waste tank in right background. Operative points to 5" aluminum pipe. 3" outlets are in the weave room on the floor above.

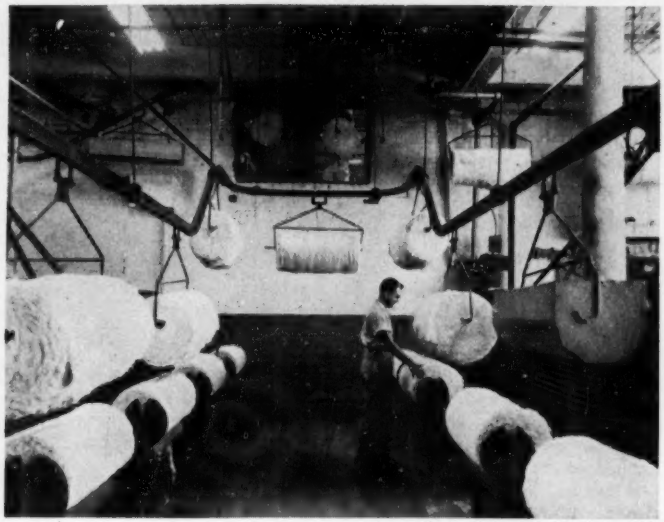
OPERATIVE cleans loom with flexible aluminum vacuum hose. The hose may be equipped with any one of several different types of nozzles. Note outlet on floor.



RAISE production..LOWER costs







Photos: Courtesy Springs Cotton Mills

with "Zig-Zag" Continuous Power Conveyors

Here you see how "Zig-Zag" solves a complex handling problem in the Springs Cotton Mills at Lancaster, South Carolina. In almost every imaginable industry, R-W "Zig-Zag" Conveyors are serving production and processing lines—increasing efficiency, cutting costs. Specifically designed to carry light loads through confined or crowded areas, "Zig-Zag" is adaptable to almost every plant condition or layout. And the savings effected with R-W "Zig-Zag" Conveyors are so substantial, the equipment pays for itself quickly—in most cases in less than a year! For further information, call, write, or wire our nearest office.

ENGINEERED FOR ECONOMY AND FLEXIBILITY

- Horizontal and vertical units alternate in a continuous chain traveling through special steel tubing.
- Complete flexibility for installation in any plant. Easily installed, easily changeable to conform to plant alterations.
- SAFE—all moving parts are fully enclosed.
- Low first costs. Low Power Factor.
- Standard horizontal or vertical curves—two-foot radius.

1880 RICHARDS WILCOX R-W AURORA TRADE MARK Reg. U. S. Pat. Off. 1951

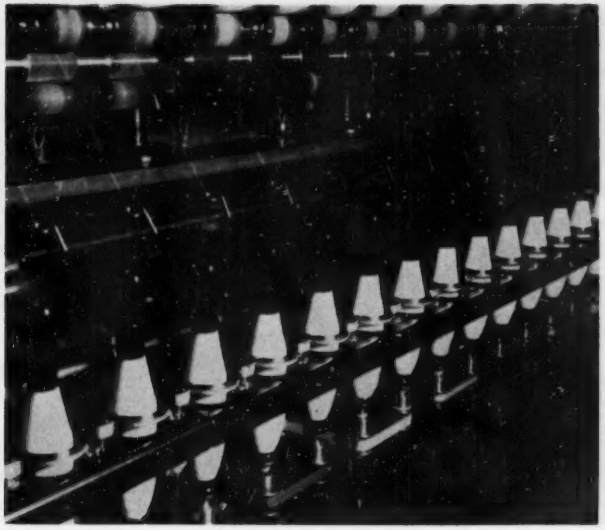
OVER 71 YEARS

Richards-Wilcox Mfg. Co.

"A HANGER FOR ANY DOOR THAT SLIDES"

AURORA, ILLINOIS, U.S.A. *Branches in all principal cities*

SLIDING DOOR HANGERS & TRACK • FIRE DOORS & FIXTURES • GARAGE DOORS & EQUIPMENT
INDUSTRIAL CONVEYORS & CRANES • SCHOOL WARDROBES & PARTITIONS
ELEVATOR DOOR OPERATING EQUIPMENT



Textile Industries Presents

SAVE LABOR
REDUCE WASTE
SIMPLIFY JOBS
IMPROVE QUALITY
INCREASE PRODUCTION

MODERN PRODUCTION METHODS

consideration and attention to rings and travelers in spinning.

Conical oil type rings are used on Whitin F-2 spinning frames processing 100% 2½" nylon staple at Newnan. The conical shape of the rings produces an outward and downward action with the traveler riding on the top and side face of the ring, thereby permitting operation with less drag or resistance. Less yarn breakage and increased production of high quality yarn with reduced waste are attributed to the unique features of these rings.

The flow of oil to the traveler is controlled, and no rewicking is necessary; therefore a cleaner fabric may be produced, and less oil is consumed. The management at Newnan Cotton Mills has asserted that Herr conical rings are especially suited to running nylon staple yarns.

Case 78

Hosiery Mill Uses Instrument To Match Colors Accurately

Industrial Development Laboratories' instrument eliminates the human element of error in visual inspection of full-fashioned hose for color matching.

ONE of the leading brand-name full-fashioned hosiery mills has installed in its dyehouse the Color-Eye instrument which measures and compares the shades of a dyed batch of hosiery with the standard sample adopted by the mill for various colors.

The instrument is based on the flicker photometer principle and eliminates the inaccuracies in judging color matching by the human eye.

Experience at this mill shows that the samples should be folded in the receiver of the machine in exactly the same manner each time and using the identical folding as used on the standard color with which the sample is being compared.

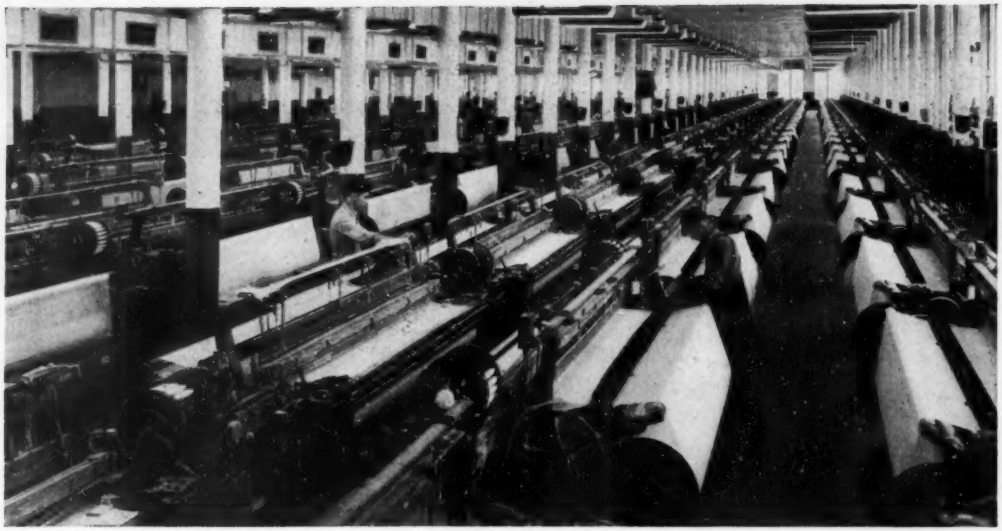
The chief dyer uses the machine for checking the proportionate amount of the primary colors in a sample, as compared with the mill's standard. Given three readings for each primary color content in dyed hosiery, the dyer is able to correct or change colors in the next batch of hosiery to be dyed by the addition or reduction of certain dyestuffs.

Should the shade be too far off standard, the dyer would strip the hose and redye them.

According to the chief dyer at this hosiery mill, the machine eliminates the human element of error in visual inspection of the hose for color matching. The mill also uses the Color-Eye to check outgoing merchandise after it has passed through the plant and prior to shipment. Its usefulness is shown by the fact that no customer returns have been made because of off-shade.

Other services for the machine have been found by the sales department and the operating management of the mill to check on the work of the dyehouse without relying on the visual inspection and visual opinion of several different persons under varying conditions of light.

In addition to dyehouse checking, the instrument may be employed to match customer pack-



They don't want us to use their name but...

They were among the first cotton mill groups to recognize the value of Carrier air conditioning.

Their first air conditioning installations were made about 1924 in two plants. Both plants were conditioned by Carrier Central Station Systems.

They increased machinery loads in 1942 and 1945 — required additional air conditioning to offset increased heat loads. They added Carrier Central Station Systems. The original systems were still operating and in excellent condition.

Again in 1945 they cooled by Carrier Central Station Systems still another mill which had previously been operating on atomizers. Existing atomizers were used in weave room combination systems for high humidities.

They use 18 Carrier Central Station Systems in these three mills. Six have been in use for over 25 years. We think that is a pretty good indication of their belief that when it comes to air conditioning your best investment is Carrier. Carrier Corporation, Syracuse, New York.

Carrier

AIR CONDITIONING • REFRIGERATION • INDUSTRIAL HEATING

ages, boxtops, etc. As time goes on it is possible that other uses will be found for the machine.

For the future the machine serves as an addition to the means for keeping dyehouse records in that numerical figures on the various shades may be used. This will aid the dyer in duplicating colors following a lapse of time, and permit him to do so on a numerical basis rather than a branded dye formula basis.

Case 79

Underframe Cleaners Do Better Job than Manual Methods

GASTONIA Combed Yarn Corp., of Gastonia, N. C., has now had the American MonoRail under-frame cleaners on four of their spinning frames for about 15 months. On the basis of results accomplished on these four frames, they have just installed the same cleaning system on 48 more frames.

Experience with the four frames on which the cleaners were first installed showed that the need for hand brushing has been eliminated, and the underframe cleaners do a better job than was formerly done by hand.

The new installation on 48 frames has made it possible to shift three men, who were used for brushing the frames, to other departments in the mill, thereby accomplishing a major savings on labor. Although no definitive tests have been run, the management at this mill is positive that yarn quality has been improved.

Case 80

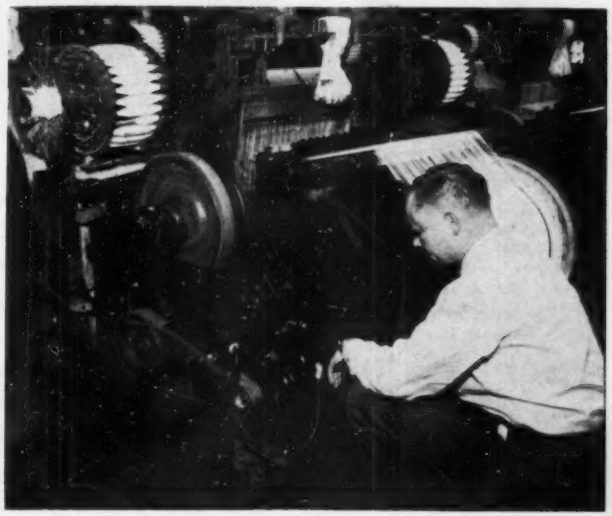
Less Trouble, More Production with Flat Belt Loom Drive

FORTY-TWO J. E. Rhoads & Sons loom drives being installed at Opelika Mills, Opelika, Ala., show promise of reducing maintenance, supply costs, and increasing production and speed of looms. One of the drives has been operating for approximately 20 months with good performance. Ten of the drives have been in operation satisfactorily for more than a year.

According to management at this mill, the drives operate smoothly and reduce shock to all loom parts, thereby improving operation of the looms and preventing excessive wear due to reciprocating motion of the looms at high speed.

At Opelika Mills 84 looms are assigned to each fixer, and the management there plans to test 42 Rhoads drives as compared to 42 other drives on looms in one fixer's stand. Records will be kept on all of the looms in this stand for a period of one year, and a comparison will be made to determine exact costs. The loom fixers like the Rhoads drive, claiming less trouble with it.

Loom at Opelika Mills equipped with the Rhoads flat belt drive.



BROWN INSTRUMENTATION IS KEYED TO THE NEED OF EVERY TEXTILE PROCESS

Check What This Means To You!

- ✓ Complete line of instruments
- ✓ Unbiased recommendations
- ✓ Nationwide sales and service
- ✓ Application engineering experience and know-how
- ✓ Textile process specialization

FROM filament and fiber to finished product, Brown Instrumentation is contributing operational as well as economic improvement to a variety of special processes. In your own plant, it can open the door to higher production, increased efficiency, greater economy and finer quality... through an approach to your problems that extends far beyond the mere specification of instruments and controls. Call in our local representative for a detailed discussion today . . . he is as near as your phone!

MINNEAPOLIS-HONEYWELL REGULATOR CO., *Industrial Division*, 4492 Wayne Ave., Phila. 44, Pa. Offices in more than 80 principal cities of the United States, Canada and throughout the world.

MINNEAPOLIS **Honeywell**

BROWN INSTRUMENTS

Starch Handling at Pineville

Food processing equipment adapted to mill use provides a modern mechanical system which saves time and labor in handling starch.

Staff Prepared

FOOD processing equipment has invaded the textile field at the Pineville (N. C.) Plant of Cone Mills Corporation. When this plant was modernized recently, the management went in search of suitable starch handling equipment for the size cooking room. They found what they wanted in a combination of several pieces of food processing equipment.

Before the mill was modernized, starch was scooped from basement bins and dumped into buckets. These buckets of starch were then carried to the cooking kettles, weighed on standard scales, and dumped into the kettles to be cooked.

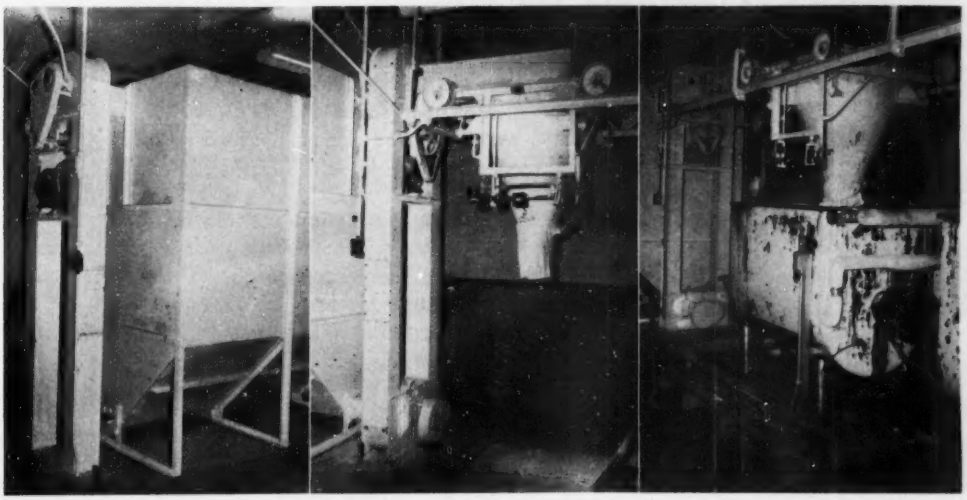
The laborious and time consuming method has been replaced with a modern mechanical system. An enclosed bucket conveyor lifts the starch from the basement storage and dumps it onto a screw conveyor which runs across the top of a steel storage hopper in the size room. The hopper provides plenty of temporary storage space, and the screw conveyor keeps the starch evenly distributed throughout the hopper.

When starch is needed in the cooking kettles, a screw conveyor in the V at the bottom of the hopper loads starch into a second bucket conveyor which lifts it up to a short screw conveyor mounted at about the height of the hopper. This short screw conveyor, in turn, loads a special, cone shaped, weighing hopper which rolls on rails above the cooking kettle. A push button switch controls delivery of starch from the storage hopper to the weighing hopper, and when the proper weight is reached, the flow of starch is automatically cut off.

When the proper amount of starch has been weighed, the operator pushes the weighing hopper down the rails until it is in position above one of the cooking kettles. The starch is dumped into the kettle and the hopper is returned down the rails to loading position.

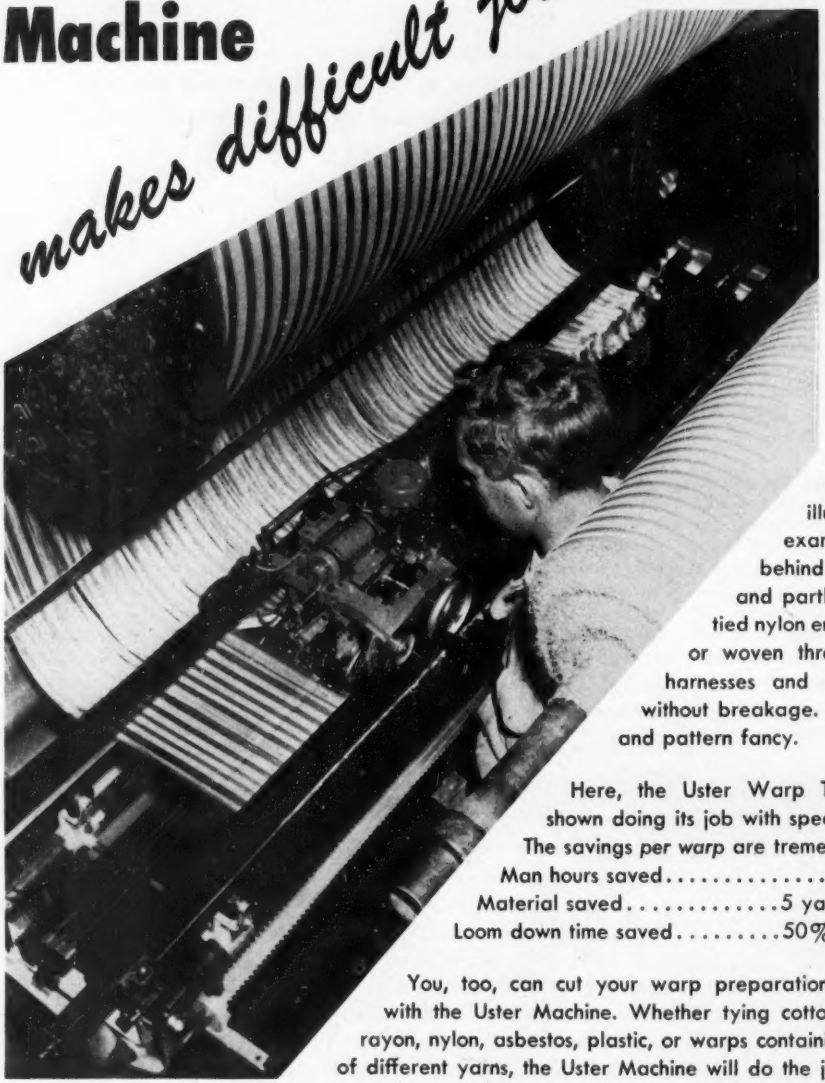
The starch handling equipment was manufactured by the Cham-

BUCKET CONVEYOR (left) lifts starch from basement to temporary storage in hopper located in size room. Center, another bucket conveyor delivers starch from temporary storage hopper to automatic weighing mechanism. Right, weighed starch is moved down rails and dumped into cooking kettles.



The USTER Warp Tying Machine

makes difficult jobs easy!



This photograph illustrates a typical example. The space behind the loom is limited and partly obstructed. The tied nylon ends must be pulled or woven through a maze of harnesses and drop wires, and without breakage. The sley is heavy and pattern fancy.

Here, the Uster Warp Tying Machine is shown doing its job with speed and efficiency. The savings *per warp* are tremendous. . . .

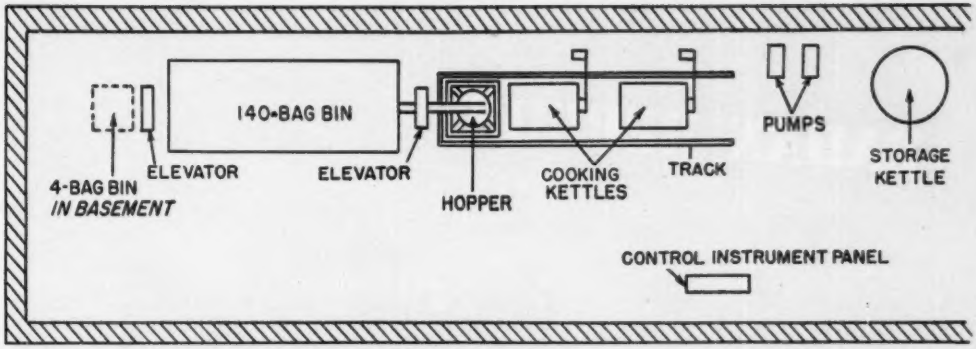
Man hours saved 19½
Material saved . . . . . 5 yards
Loom down time saved 50%

You, too, can cut your warp preparation and tying costs with the Uster Machine. Whether tying cotton, wool, worsted, rayon, nylon, asbestos, plastic, or warps containing a combination of different yarns, the Uster Machine will do the job right and with ease—operating either portable or stationary. It is the fastest, most efficient and versatile warp tying machine built.

In Canada: Hugh Williams & Co., 47 Colborne Street, Toronto, Ontario

USTER CORPORATION, CHARLOTTE, N. C.

80 Boylston Street, Boston 16, Mass.



Size preparation room at Pineville. Sketch shows relative position of equipment.

pion Machinery Co., Joliet, Ill. It is simple to operate and easy to maintain. All of the conveyors, from the basement storage to the screw conveyor which ultimately loads the weighing hopper, are powered by two 1½ hp, a-c motors. Using this system, no starch is handled manually anywhere along the line, and weighing is completely automatic.

Metered Water. Not only is starch handled mechanically; water to the cooking kettles is metered automatically. By the use of a meter manufactured by the Neptune Meter Co., the amount of water going to each batch is measured and automatically shut off when the proper amount has gone into the kettle.

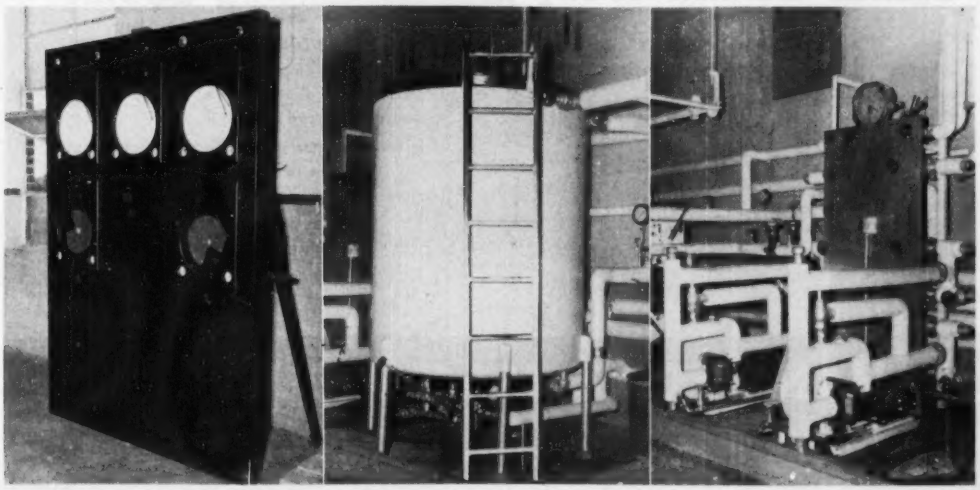
Knowing the amount of starch dumped into a cooking kettle, the operator sets the water meter for the proportionate volume of water. He then opens the water valve to the cooking kettle, and the correct amount of water is delivered, and the valve closes automatically.

Cooking Cycle. A size control system, designed and installed by Brown Instruments Division, Minneapolis-Honeywell Regulator Co., controls the size kettles, storage tank, and the cooking cycle. A temperature regulator and recorder are used for each cooking kettle and the storage tank. The storage tank uses a simple regulator which controls the flow of steam so that the temperature is maintained constantly at 190 F. A recording instrument provides a record of temperatures maintained in the size vessels.

The timing system for the cooking kettles is a little more intricate. Each cooking kettle has its temperature regulated by a cam so cut that the temperature is brought up gradually to 210 F over a period of 1½ hours. This temperature is

(*Continued on page* 221)

SHEET METAL CAMS below outside charts (left) on instrument panel control temperature and time of cooking. Center chart indicates temperature in storage tank. Center, storage kettle is glass insulated. Temperature is maintained by automatic controls. Right, two feed pumps are used. Pump on left supplies water to cooking kettles, amount of water being controlled by gauge at top of valve panel board. Pump at right recirculates size through slasher and storage tank.



Bahan Dependability stands behind every BAHAN REBUILT Loom!

"BAHAN REBUILT" describes the complete renovation and modernization of your old looms by Bahan craftsmen in the plant of Bahan Textile Machinery Company, in Greenville, S. C. Looms so rebuilt —in the plant which for 32 years has manufactured dependable new loom parts —are in every respect the equal of NEW LOOMS!

"Pick-up and Delivery" service by Bahan's own trucks is employed where practical, to reduce cost, to save time, and to assure delivery in good order.

In having Bahan modernize your looms you pay only one profit for labor and materials—and you have the satisfaction of knowing that Bahan dependability stands behind every "BAHAN REBUILT" loom!

We cordially invite your inquiries.

BAHAN TEXTILE MACHINERY CO., Inc.

DESIGNERS AND MANUFACTURERS OF RELIABLE TEXTILE MACHINERY FOR OVER 30 YEARS

Greenville, South Carolina

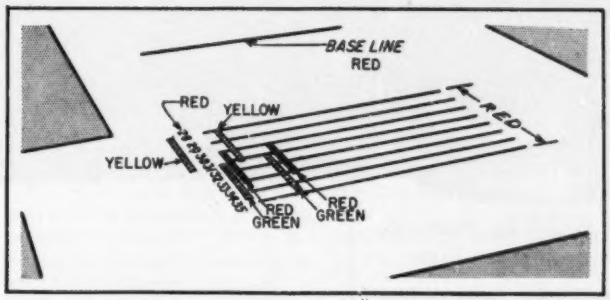
Measuring Table Aid Speeds Hosiery Matching Operation

ASSORTING full-fashioned hosiery according to length is greatly facilitated at MKM Knitting Mills, Manchester, N. H., by a very simple "comparator" chart. The measuring device permits clearly visible length readings and, at the same time, provides means for separating stockings into short, medium, and long classifications.

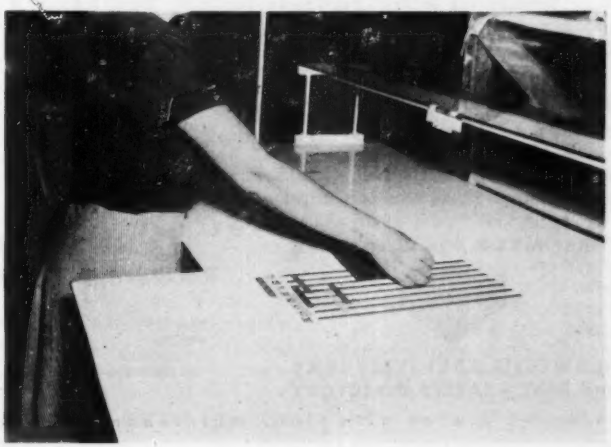
Staff Prepared

This practical index is painted in bright colors on the top of a white table. It consists of a red base line, eight red lines at one inch intervals ranging 28 to 35 inches from and parallel to the base, red numerals, and three tolerance lines which represent minimum and maximum limits for short, medium, and long standards. The tolerance lines are yellow, red, and green, respectively.

In using the chart, the operator places toe of stocking on the base line, pulls welt over to the graduated sector, and obtains measurement. Due to the chart's color system and legible calibrations, it is considered an improvement upon the yardstick. Length sorting has been accelerated and the incident of error reduced.



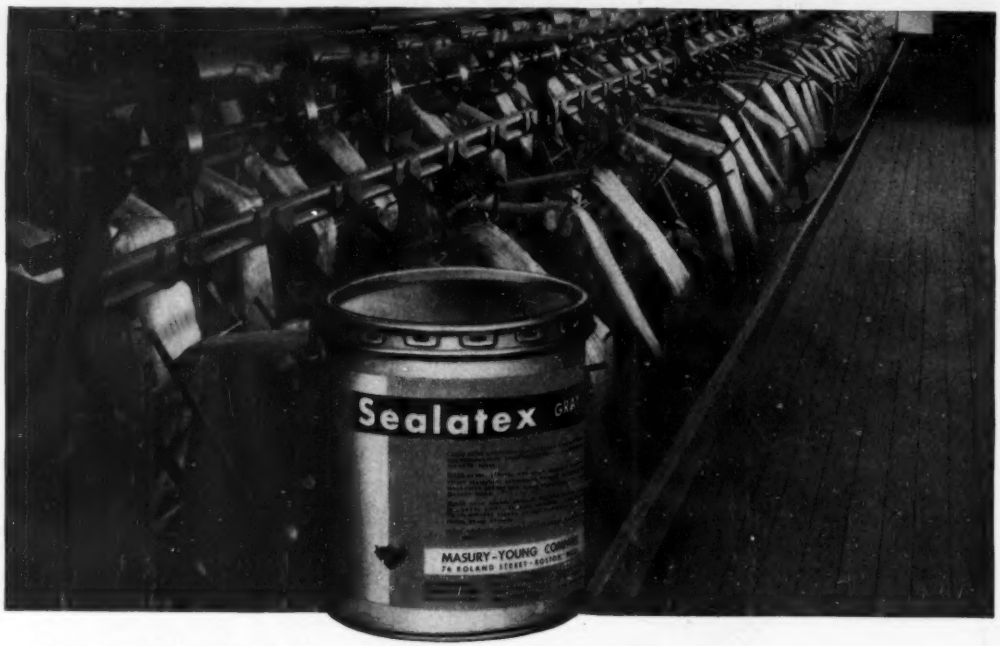
THE DIAGRAM at the left shows method by which lines and numerals are painted on the measuring tables at MKM Knitting Mills. Note that color of paints used is indicated.



ASSORTING HOSIERY according to length by use of the "comparator chart" improvised at MKM Knitting Mills. Clearly visible length readings are provided. Also, stockings are separated into short, medium, and long classifications.

NEW FLOOR-SAVING DISCOVERY

Every day more textile men are discovering that tough, durable, non-slip SEALATEX is the ideal treatment for *new* or *old* mill floors.



SEALS OUT DIRT, GREASE, OIL AND WATER by penetrating wood or concrete floors.

RESISTS TEXTILE OILS which often destroy other types of floor seals.

DOESN'T CRACK FROM FLOOR VIBRATION because it has a chlorinated-rubber (Latex) base.

SIMPLE TO USE. Requires *no* costly equipment. Dries in 2 to 4 hours.

CUTS FLOOR MAINTENANCE COSTS 50% OR MORE. GIVES brighter, safer floors with less effort and expense.

For further news about remarkable SEALATEX, and Masury-Young Company's FREE TECHNICAL SERVICE, contact your nearest Masury-Young office or write

MASURY-YOUNG COMPANY
Established 1857
76 Roland Street • Boston, Mass.

Other MYCO Products Listed
MYCO PRODUCTS
In SWEET'S ARCHITECTURAL and BEST'S SAFETY DIRECTORY

MASURY-YOUNG COMPANY
76 ROLAND STREET BOSTON, MASS.

BRANCH OFFICES

NEW YORK	11 West 42nd St.	KANSAS CITY	950 Dierks Building
CHICAGO	10 South LaSalle St.	DETROIT	424 Book Building
LOS ANGELES	440 Seaton St.	MINNEAPOLIS	253 Plymouth Building
SAN FRANCISCO	465 California St.	PORTLAND, ORE.	2319 N. E. B'way

JACKSONVILLE, FLA. P. O. Box 3412

Serving 48 States with Floor Maintenance Products and Technical Advice

Proposes Labeling Rayon Fabrics to Assure Long Garment Life

Permanent labeling of rayon fabrics to show how they should be cleaned, thus assuring long life for the articles, was proposed by Dr. Jules Labarthe, Jr., of the Mellon Institute in a recent address to the Akron (Ohio) Section of the American Chemical Society.

Discussing the work of laboratories which test fabric durability and the stability of dyes for manufacturers and stores, Dr. Labarthe recommended that greater attention be paid to the chemicals used in keeping customers' garments in good condition. Soaps, synthetic detergents, and the mechanical appliances with which the customer washes, dries, and irons her fabrics all should be considered by the chemists charged with testing the materials' quality, Dr. Labarthe said.

Standard methods of chemical analysis and standard testing procedures should be followed where they are available, he said, and if there are no standard methods they should be developed through research.

One of the most important current projects in this field is the list of rayon standards on which the American Standards Association is working, Dr. Labarthe declared.

"It is intended," Dr. Labarthe said, "that these standards will be voluntary, and that a store desiring to sell a line of rayon dresses, for example, which it can guarantee as to strength, crease resistance, seam slippage resistance, and a known degree of color fastness to all common color destroying agencies, can order these dresses to conform to the American Standard for that particular end-use item. The manufacturer would order the goods finished and dyed to meet that same standard.

"One great help I can see for the ultimate consumer and for her launderer or dry cleaner is to have a permanent label sewed in the garment, identifying the American Standard by number in such a way that any one handling the garment will know how it should be cleaned. This can be done by having the American Standard number in green if the fabric can be washed at 165 F without damage to the material, the finish, or the color; the label could be in yellow or orange for a fabric washable at a temperature not exceeding 105 degrees, which is a 'wash with care' or hand washable condition; a red label could mean that the fabric or garment cannot be washed but must be dry or wet cleaned."

Wool Mills: Handle Viscose Carefully

The use of viscose rayon by woolen mills introduces special fire safeguard problems, according to information contained in a recent issue of the "Factory Mutual Record," since it has fire characteristics similar to cotton.

In a recent survey, 42% of the 118 woolen mills queried are said to have indicated that they were using rayon in blends up to 25%. Factory Mutual tests, it was stated, show that a blend of 10% or more of viscose rayon makes the entire mixture similar to cotton in its susceptibility to fire.

The publication pointed out that even in cotton mills where rayon has been used for years and its hazards recognized, flash fires occur. New rayon has relatively little lint and fly, but flash fires have spread over machines on which rayon and cotton blends were being used. Rayon waste produces a dangerous quantity of fly, easily ignited.

There has been a total of 76 fires in rayon in woolen mills in the past five years, said the report. Most of these fires occur in blending bins, some of which contain up to 50,000 pounds of stock.

Recommendations listed to avoid these fires were: Blending bins should be kept to the smallest size possible; they should be constructed of fire-resistant materials, such as plaster-on-metal lath, or sheet-metal clad wooden boards; they require complete automatic sprinkler protection; subdividing larger bins with fire-resistant walls will help somewhat in confining fires; means of spreading the fire, such as conveyors feeding several bins, or vents between bins, should be avoided.

ACMI Administrative Changes Announced

A number of administrative changes aimed at streamlining the activities and operations of the American Cotton Manufacturers Institute have been recomended by a special committee appointed for that purpose and will be put into effect shortly, according to an announcement by George P. Swift, president.

The statistical division will be moved from New York to the main office at Charlotte, N. C. The division's activities will be stepped up and it is planned to broaden the statistical coverage of the industry.

Dr. C. T. Murchison, economic advisor, will make his headquarters in the ACMI Washington office. Paul B. Halstead, statistical division head, will be retired as of March 1, 1951.

John W. Murray has been named head of the New York office. He will continue as secretary-treasurer of the Textile Export Association and as editorial director of the ACMI but has severed connections with the National Cotton Council, of which he was editorial director.

Lubrication is the Lifeblood of Twisting Spindles

and

The WICACO SPINDLE OILING MACHINE GUARANTEES PROPER LUBRICATION!

IT flushes out the old oil and replaces it with fresh oil in one simple operation. It saves time, labor and power, and guarantees proper oil level at all times.

This machine is used successfully in many mills producing wool, cotton, silk and rayon.

Send for Descriptive Folder Now.

SINCE 1868

WICACO MACHINE CORPORATION

WAYNE JUNCTION, PHILA. 44, PA.

Manufacturers of Precision Machinery and Machine Parts

AMERICAN SUPPLY COMPANY
78 Fountain Street, Providence, R. I.

MR. RALPH GOSSETT
8 South Church Street, Greenville, S. C.

OTHER AGENTS
in Foreign Countries

Manager G. T. B. Reports:

(Name on request)

"High-Clearance Aluminum Alloy UP-RIGHT SCAFFOLDS *provide the only way to get over looms and spinning frames"*

"Man-hour savings paid for our first four scaffolds in less than 6 months . . . as a result we've added 41 more!" *adds G. T. B.*

Mobile 10 ft. span or 6 ft. span scaffolds, adjustable to desired height, take only 1 minute to erect. Superintendents and master mechanics report that *SAVINGS ON EVEN SINGLE INSTALLATIONS OR MAINTENANCE JOBS MORE THAN PAY FOR UP-RIGHT SCAFFOLDS!*

Use this most modern means for work on ceilings, ducts, overhead machinery, sprinkler systems and lighting fixtures. Stronger than structural steel yet one-third the weight. No wrenches, wing nuts, bolts or loose parts.

WRITE FOR DESCRIPTIVE CIRCULAR

Before buying scaffolds insist on a demonstration . . .

then buy the best—the one and only **"UP-RIGHT" SCAFFOLDS**

DEPT. 131 • 1013 PARDEE STREET • BERKELEY, CALIF

Sales Offices: Atlanta, Boston, New York and Other Principal Cities • Factories: Berkeley, Calif. and Teterboro, N. J.

HOW OTHER MEN Manage
• Letters to Editor • Technical Discussion •
• Manufacturing Briefs • Kinks & Shorts Cuts • Comments from Readers •

Pointers on Fixing the Batwing Pick Motion

By J. L. BOVE

PICKING motions have a tendency to run dry from lack of oil and the proper setup of the motion. When this happens the picking roll will not turn on the stud, thereby causing it to wear a flat place on the surface of the roll, or the hole in the roll will become enlarged from the pounding it receives while the loom is in motion. As may be expected, the roll will wear out the picking shoe to such extent that it will have to be replaced or ground to its original shape.

When the pick shoe is setup too high and the roll hits full on the toe, it will cause the shoe to jump, and instead of the roll riding the shoe fully (on the curved surface) to the end of the pick, it will hit the nose of the shoe with a hard blow, thus breaking the end off the nose. This condition can be seen by watching the lug stick closely, as the loom picks; the lug stick moves with a double jerk.

A method that is suitable in setting up the picking motion is as follows: Picking roll to hit on shoe at least ¾ of an inch from the toe. If set in this manner when the loom is in motion, the roll will ride on the full curvature of the shoe.

Pick Cam Alignment. Aligning the pick cam is very important. The practical adjustment that is most suitable in setting and aligning the pick cam to get the full benefit of the pick, and inflict the least trouble when in motion, is as follows: Set the cam so that half of the roll will rest on the nose of the shoe. If more than half of the roll rides the shoe, it has a tendency to push the cam out of alignment and also chip the edge off the roll which will ruin both the pick shoe and roll due to the rough spots on the roll.

Replacing Pick Rolls. When replacing badly worn pick rolls, the new roll should be cleaned and polished and the sharp edges rounded and smoothed. A good method to use in taking off the sharp edges is to place the new roll on a stud; then apply washer and cotter key. Hold the roll against the grinding wheel until slightly rounded and sharp edges are removed. Polish on a fine emery disk.

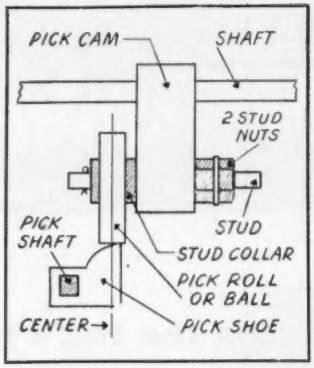
If the hole in the roll contains paint, rust or accumulations of dirt or is roughened, the following procedure is one of the best to use: A piece of ½-inch rod inserted in the chuck of the drill press and wrapped with a strip of emery cloth will make a very good polishing tool (see illustration). While the spindle turns at a high rate of speed, the emery cloth

Type of pick motion referred to by the author. This loom is set up to run a woolen warp.

that is wrapped around the rod will remove paint, dirt, and other deposits, and at the same time it will polish the surface of the hole in the roll.

Occasionally when applying a new roll on the stud, the roll may be too tight. To overcome the tightness and have the roll turn freely on the stud, use the same method as previously described. Polish the hole in the roll and also polish the stud on an emery disk. By having a smooth surface on both the stud and roll, much time and trouble will be avoided. Otherwise, if the stud and roll have rough spots on their surface, damage will be inflicted in a short period of time.

Before a new pick shoe is put into use, paint and rough edges on working surface should be removed. If the shoe is not polished, in time it will wear out the pick roll. Grinding of pick shoes can be overdone. If the shoe has the surface ground into a sharp hook, the pick is too harsh. The results are: broken parts, and improper checking of shuttles, due to the lug being raised too high. When the lug is raised too high, the shuttle is not checked uniformly. Sometimes the shuttle will come into the box with a hard impact, and at other times it will barely reach its destination. If it comes into the box too slowly, an occasional bang-off will occur.

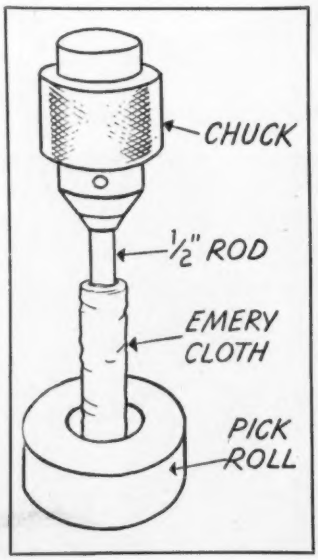


Showing proper relation of component parts of batwing pick motion.

When the aforementioned conditions exist, the cloth may be seriously damaged. Such conditions may cause rough cloth, lumps from the filling sloughing off the bobbin, and many other defects which could be avoided if the pick shoe had the proper curvature. Pick shoes are case hardened, and if ground below the hardened surface, damage to the pick motion is likely to occur. On some worn shoes, grinding to obtain pick is necessary, but it should be done with care.

There are many types of set screws; the type that is most suitable to use for pick shoes is the cup-pointed set screw. These will not become loose as often as a round nose set screw. Round pointed set screws are the cause of much trouble when removing a pick shoe from the shaft. The point becomes flat from the impact the shoe receives, and the set screw will not turn when the wrench is applied. There are various methods of removing damaged set screws without injuring the threads on the shoe. One method is to snap off the top of the set screw and drill it out.

Run emery-covered mandrel through pick ball holes until all rust, dirt, and foregn matter are removed.



Pick Shaft Stop. The pull back spring on the pick shaft stop should have the least tension possible. If too much tension is applied, the stop will hit the loom frame with a hard impact which will cause considerable damage. The hard blow will crack the stop, break or loosen the adjusting screw, and eventually wear a hole in the loom frame.

A simple method to use in preventing damage to the pick shaft stop is as follows: first, remove as much tension as possible from the pull back spring. Then procure rawhide blocks approximately 2 inches long, 1½ inches wide, and ¼ to ½ inch thick, and bolt on to the loom frame. Whenever the adjusting screw strikes the rawhide block, the block will absorb the shock. Pick shaft stop should be protected as much as possible from breaking. Considerable time and production can be lost when a stop breaks.

Pick Shaft. When a loom fixer removes a pick shaft from the loom and wear shows on both bearing ends (occasionally wear will show where the pick shoe is placed), it is best to replace the shaft with a new one. If the front bearing end does not show wear, the shaft on some looms can be reversed.

Removing a pick shaft is a simple matter if the job is done correctly. On some looms the front bearing is much more easily removed than the rear bearing. The front bearing contains only one bolt, whereas the rear bearing contains two or three bolts. It is much easier to remove one bolt than it is to remove two or three. Before removing the front bearing, first remove stud which connects sweep arm and stick, unfasten pull back spring, then remove front bearing and pull pick shaft out of the rear bearing.

To save time and keep production up in weave sheds, assembled pick shafts should be kept on hand. Whenever a part is broken or worn out, the old pick shaft can be taken out and replaced with the shaft that is already assembled. The shaft that is removed from the loom can be fixed when time permits.

FROM CIBA RESEARCH . . .

3 NEW NEOLANS

These newest additions to the Ciba Neolan Family have been developed to brighten the range of greens and yellows heretofore available.

In the Neolan-best-for-wool tradition, these new colors dye fast and level, are simple to apply, and are easy to shade.

Also, these Neolan greens are exceptionally stable to prolonged boiling.

Data on dyeing procedures, dyed samples and complete tables of properties are now ready.

CIBA

CIBA COMPANY INC.

627 GREENWICH STREET, NEW YORK 14, N. Y.

Boston Providence Chicago San Francisco Charlotte Philadelphia

SAVE PRODUCTION TIME . . . .

HINNEKENS 3-ROLL CALENDER GIVES HYDRAULIC PRESSURE UP TO 50 TONS

When production time is your most pressing problem, put the Hinnekens "Hydraulic Calender" to work for you.

THIS MODERN CALENDER has the Hinnekens' patented Roll Equalizing Device that assures perfect alignment when the rolls are raised or lowered. Roll faces remain parallel, preventing wearing of paper rolls taper at the ends.

Let a Hinnekens Sales engineer suggest the proper calender for your use.

Contact the representative nearest you.

OUTSTANDING FEATURES:

- **Main frames of welded steel construction.**
- **Adjustable tension let-off and slip belt take-up.**
- **10″ diameter roll ground and polished with chilled iron center, bored chamber for steam heating.**
- **20″ diameter paper roller mounted on Timken tapered roller bearings.**

HINNEKENS MACHINE CO., INC.

DESIGNERS AND BUILDERS OF CUSTOM-QUALITY DYEING, BLEACHING & FINISHING MACHINERY

New England Representative . . .
MR. PETER JASWELL
37 BRENTWOOD AVE.
PROVIDENCE 8, R. I.

Southern Representative . . .
T. E. LUCAS ASSOC. INC.
P. O. BOX 1696
CHARLOTTE 1, N. CAROLINA

Mexico and South America . . .
MEYER, LYRA & CO. INC.
227-229 FULTON ST.
NEW YORK, NEW YORK

Slasher Roll Rust Preventive

EDITOR TEXTILE INDUSTRIES:

I have tried several methods to prevent rust on slasher squeeze rolls made of iron. Such methods as copper spray and white lead are satisfactory for awhile, but after a period of time rust spots on warps may be traced to the squeeze rolls.

If the squeeze rolls are slipped into a brass or copper pipe all such rust spots will be prevented. An eighth-inch or quarter-inch thick brass or copper pipe the same diameter as the squeeze roll may be fitted over the squeeze roll and brazed on each end. Then the brazed ends should be turned down, and the roll should be turned on the lathe to eliminate any eccentricity.

Should the squeeze roll blankets slip, a piece of burlap may be placed next to the roll, and a piece of burlap may be inserted between each blanket on the roll.

This method of rust prevention has proved satisfactory in that we have eliminated much work on squeeze rolls. Production has been increased because of less waste and loss of production time.

CONTRIBUTOR No. 8347

Comments on Doff Boxes

EDITOR TEXTILE INDUSTRIES:

Most card rooms never seem to have enough doff boxes, especially when roving production is more than the spinning department can take care of. If full capacity of the card room is in excess of spinning production facilities, provisions should be made for properly stacking roving in suitable bins or other compartments.

The best place to store roving is on the top of spinning frames, but if the roving is stacked over two layers high, the bobbins may fall on some one or the spinners may complain about having to reach so high for the bobbin when it is necessary to creel in the roving. Production of the card room and spinning rooms should be balanced as nearly as possible so that there will be little difference between the production of each department.

If roving frame operators have to wait for doff boxes when frames are ready to doff, then efficiency is bound to suffer. It is fundamental to have enough equipment on hand to keep roving frames running at top efficiency at all times.

A good rule of thumb to be followed on the amount of doff boxes to have on hand in order not to impare efficiency is as follows: Where spinning is well balanced with roving production, approximately two serviceable doff boxes per frame should be enough to keep the roving frames from waiting on doff boxes. If roving frame production exceeds spinning production and some roving is stored in boxes, then it is a good idea to have 3 or 4 serviceable doff boxes on hand at all times for each roving frame. It is necessary to have roving boxes of adequate size.

In many mills one or more operators are responsible for moving boxes of roving from frames to the next department. It is his responsibility to see that roving is moved away from the frames and also to keep the boxes in good condition. These operatives should check casters on all boxes at least once a week and remove chokes of lint and dirt from casters before they clog up so badly that the wheels don't turn properly. Also they should see that all doff boxes are clean so that the roving will not be damaged by dirt or grease.

Boxes for roving should never be used for anything else but roving. The practice of putting machine parts, rollers, or waste into doff boxes should be prohibited. Doff boxes should be marked as doff boxes, and mote or waste boxes should be painted another color or marked differently so that

Kink Contest

$ $ Your Idea May Win $100 $ $

This contest ends March 15, 1951

ONE HUNDRED DOLLARS will be awarded for the most helpful short cut, kink, time-saving device, cost-cutting suggestion, or quality improvement idea submitted by March 15.

Contributions eligible for the prize must not have appeared elsewhere and must not be sent to any other publictaion.

All material will be paid for at regular space rates upon acceptance, irrespective of the contest winner. Advise when submitting entry if participant's name may be used. Only one award will be made at the close of each contest.

Participants are not restricted as to number of items submitted to compete in the contest. Each entry should be described in sufficient detail to make it easily understood, and where possible, glossy photographs or pencil sketches should be included. Finished drawings are not necessary.

All entries for this contest must be postmarked not later than midnight, March 15, 1951. Address: Editor "Textile Industries," 806 Peachtree Street, N. E., Atlanta 5, Georgia.

Faster

More Thorough Removal of LINT

WITH

HANSEN

COUPLINGS AND BLOW GUNS

Photo—Courtesy Harriet Cotton Mills

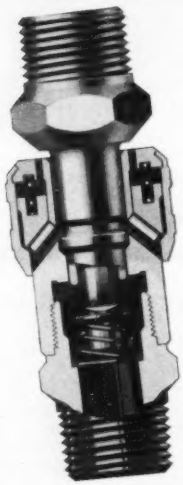
Socket
No. 5300

Hose Clamp Plug
No. 5-PP19

Hose Clamp
No. HC-2P19

Air Blow Gun
No. 25

10" Extension Nozzle
No. 26



- Lint and fly can be quickly removed from carding machines, spinning frames and looms through the use of Hansen quick-connective couplings and an Air Blow Gun.

By equipping conveniently located air stations with Hansen quick-connective couplings, it is a simple matter to move from station to station with a short hose and the Hansen Air Blow Gun.

To connect the air hose at any station, you merely push the coupling plug into the socket—air is instantly and automatically available at blow gun.

To disconnect, just push back sleeve on coupling socket—plug immediately releases and flow of air is shut off at station.

Change-over from air blow gun to solvent spray cleaner takes only a few seconds.

Write for catalog and details.

REPRESENTATIVES

BALTIMORE
BIRMINGHAM
CHICAGO
CLEVELAND
DALLAS
DAYTON
DENVER
DETROIT
FT. WAYNE
HARTFORD
LOS ANGELES
LOUISVILLE
MILWAUKEE
MINNEAPOLIS
MONTREAL • TORONTO
NEW ORLEANS
PITTSBURGH
ROCHESTER
SAN FRANCISCO
SAVANNAH
SEATTLE
ST. LOUIS

Export Department: CLEVELAND

SINCE 1915

THE HANSEN MANUFACTURING COMPANY

4031 WEST 150th STREET • CLEVELAND 11, OHIO

there can be no mistaking the two types of boxes.

Roving frame operators should keep spindle tops clean and clean out the tops of bobbins so that greasy lint will not accumulate there and fall from the inside of the bobbins onto the roving when the frame is doffed. Empty drink bottles should never be collected in doff boxes because the sticky syrup that drains from the bottles will ruin all the bobbins that come in contact with it. Roving is a very delicate stock and should be handled as carefully as possible.

CONTRIBUTOR No. 8343

Discussion on Best Method to Handle Card Room Waste

Question Briefed: *At present we are hauling waste by auto trucks from the card room to the waste baler, which is located in a separate building. Cost of handling the waste may amount to more than the waste is worth. We are interested to know how other mill men would handle this problem.* (CONTRIBUTOR No. 8263, *June*, 1950).

EDITOR TEXTILE INDUSTRIES:

I have read with interest the problem of CONTRIBUTOR No. 8263 regarding handling of card room waste, and I would like to give my observations on the problem and the possible solution to the problem as I see it. Transportation of waste or stock in process is one of the most fertile fields to investigate when the mill executive or the supervisor is seeking means of cutting operating costs. The transfer of material in most mills is still done to a large degree by manual labor and offers an excellent opportunity to substitute mechanical means for manual labor.

Several mills have already adopted automatic conveyor systems for handling laps. These systems are not only more efficient to operate but at the same time they do away with the possibilities of errors on the part of the operator.

Any solution to the waste handling problem should be worked out to exclude as much as possible all manual labor. If a ramp way from the mill to the waste house is built, it should have a conveyor built in so that the boxes can be placed on it and carried down to the waste house rather than pushed down by manual labor. Also, provisions should be made to reverse the conveyor so that the empty boxes may be returned in the same manner. Any installation of this type should be made to do away with as much manual handling as possible so that the installation can be amortized as rapidly as possible.

After thoroughly analyzing the situation the only practical way to handle the problem seems to be to blow the waste from the mill to the waste room. The initial cost of

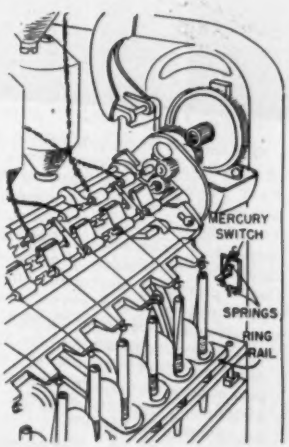
Spinning Frame Stop Motion Helps Reduce Waste

A mercury switch may be utilized on spinning frames to stop each machine automatically when the bobbins are full. It is no longer necessary for the spinners to watch each frame carefully to ascertain when it is ready to be stopped for doffing.

The accompanying sketch shows the arrangement being used at the Aragon, Ga., plant of A. D. Juilliard & Co., Inc. The installation is simple, requiring only a mercury switch, an extended lever for the switch, two small coil springs, a pin or screw which is fastened to the ring rail, and the necessary wire to connect the circuit to the regular knock-off motion.

According to Carlyle Summey, overseer of carding at the Aragon plant, the stop motion is set to stop all frames when a predetermined amount of yarn has been wound onto the bobbins. Less waste is now in evidence because the bobbins contain a uniform amount of yarn. Manually stopping each frame left an element of guesswork in determining the amount of yarn on the bobbins at each doff.

In operation, the pin on the ring rail trips the mercury switch when the ring rail reaches its uppermost point of operation. Upon the final downstroke, the pin depresses the switch, thereby stopping the frame at the same interval of operation for each doff. The installation was made by the mill mechanic.



ORR SLASHER CLOTH

. . . . WITH SPECIAL CHEMICAL TREATMENT

SOMETHING NEW AND BETTER

Slasher Cloth is an important maintenance item in a cotton mill. With the introduction of ORR *Slasher Cloth with Special Chemical Treatment*, many of the problems which have pestered the slasher room foreman have been eliminated.

The slasher room foreman, in order to satisfy the superintendent and the cost department, must have available a *Slasher Cloth* which will:—

1. Dress the yarn properly.
2. Hold its width. No shrinkage.
3. Maintain level production performance.
4. Start fast—last long.

ORR *Special Treated Slasher Cloth* maintains uniform dressing properties, resists bacteria and steam degradation, maintains dimensional stability.

Discuss your *Slasher Cloth* problem with your ORR representative.

Industrial Woolens by Orr

STARTS FAST—
LASTS LONGER

DISTRIBUTED BY

J. S. FALLOW & CO.
279 Union St.
New Bedford, Mass.

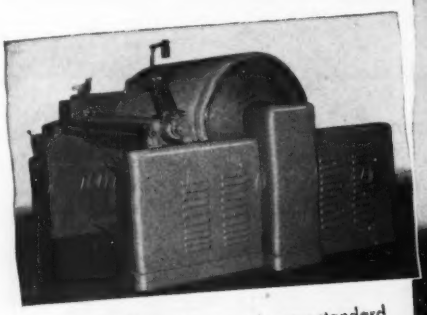
OLIVER D. LANDIS
718 Queens Rd., Charlotte 7, N. C.
Telephones: 3-0958 - 3-4557

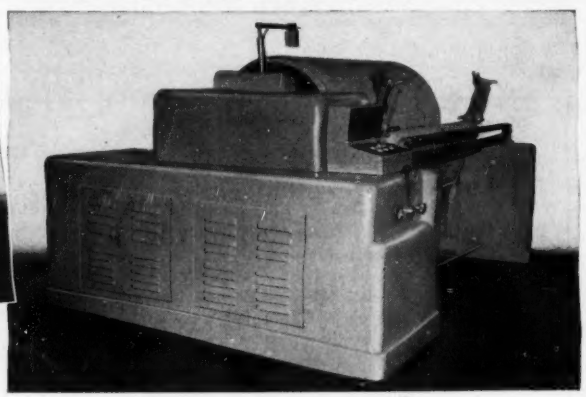
P. W. COLEMAN
Box 1393
Greenville, S. C.

MANUFACTURED BY

THE ORR FELT & BLANKET CO.

PIQUA, OHIO, U. S. A.





Gessner has set an entirely new standard of decating with the already famous "Versamatic" Semi-Decating Machine. Hydraulically powered, Gessner's Versamatic exercises controls of the decating process never before possible. A wider latitude of cylinder speeds is possible, the problem of apron straightening is practically eliminated with automatic apron alignment and tension, steam is conserved and condensation damage prevented by the unique operation of the cylinder. All drives and drive parts are fully enclosed. A control panel to regulate the entire sequence of steaming and cooling cycles is optional equipment.

Write us for the "Versamatic" booklet just off the press.

"Versamatic"

establishes decating quality at a new and higher level

DAVID GESSNER CO.

Worcester, Massachusetts • Improved Cloth Finishing Machinery

Canadian Representative: W. J. Westaway • Montreal, Que. — Hamilton, Ont.

this set-up could well run into quite a bit of money but would lend itself to less manual handling than many other ways.

The fan would not have to be very strong because the waste is being moved down rather than up. It may be worthwhile to investigate the possibilities of using a gravity flow system, but it is doubtful that there would be enough slope to make this practical. If this system were adopted, I would suggest that a system of movable bins for each type of waste be made also, whereby a bin could be filled with one type of waste and then rolled over to the press and baled. The bins could either be circular with different compartments for different types of waste or rectangular in shape with separate compartments for each type of waste.

The bins should be on a track arrangement so that they can be easily moved by the waste house operator and should have trap doors in the bottom so when the bin is moved over the press, all the operator has to do is pull a lever and the bin empties into the press. While one bin is being emptied, another bin may be filled from the pipe opening in the waste house. In this way the baling operation is kept continuous and the time lost by the operator in manually unloading the crates and filling the press is eliminated.

If a system of this type were adopted, it is reasonable to believe that one operator could do all the work in the waste house and the only other manual labor needed would be for the operator who gathers the waste to dump it into the pipe. I would suggest that the pipe be run up flush with the floor at the point where the waste is to be dumped and a large enough opening made so that a whole crate of waste can be dumped at one time. I do not think it would be advisable to try to handle the waste without collecting it in a container first because most mills keep a pretty accurate check on the amount of waste produced on each job, and it would have to be put in a container to be weighed

The Cost of Air Conditioning

At Goodyear's tire cord plant in Cedartown, Georgia, is an installation of Central Station Certified Climate. After twenty-four years' *practically uninterrupted service*, it continues to deliver right up to the mark — "conditions as good as those found anywhere."

At Cheney's Manchester, Connecticut plant, there is another. It is in its forty-first year. Perhaps the attachment is so strong these installations are retained as souvenirs. But there is a suspicion that they earn their keep.

You can't afford Certified Climate? You could once build and equip a textile mill for the price of its air conditioning today? Sure—but would you want that kind of a mill? And how much does anything cost that pays for itself in a year or less as Certified Climate has been known to? And lasts so blamed long? Perhaps we try too hard!

ParksTurbo Cleaners in the Goodyear picture above, soon to be joined by Up-draft Cleaners operating on same track.

Parks-Cramer Company

Fitchburg, Mass. PARKS Certified Climate Charlotte, N. C.

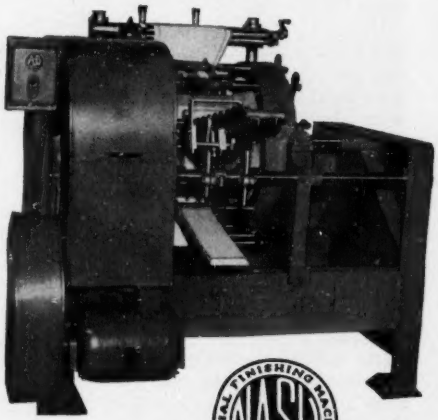
SAVE the Expense of Hand Washing with the No. 89 Nash AUTOMATIC BOBBIN WASHER

Washes flanged bobbins at 28 pieces per minute!

Textile mills throughout the country are finding the Nash No. 89 a time and money saver. It's a ten-spindle machine that does the entire washing and wiping operation automatically from start to finish. Eliminates the time and expense of hand washing. No dirt is left on the bobbin which would soil the yarn on the finished fabric. The cleaning solution used has a 140-degree flash point and is not toxic, assuring safe machine operation. The solution has no harmful effects on yarn, either natural or synthetic.

Write for complete descriptive bulletin

We also manufacture Automatic Bobbin Finishers, Quill Polishers and special-purpose machinery.



J. M. NASH COMPANY

NASH SPECIAL FINISHING MACHINERY SINCE 1890

DEPT. BW-89—2390 N. 30TH STREET MILWAUKEE 10, WISCONSIN

for the record.

On a long range basis this seems to be the most practical solution to the problem as the system is practically automatic and a minimum of manual labor is used. I believe that this system could be amortized more quickly and made to pay for itself in a shorter length of time than any other system that could be designed. This system would practically eliminate costly mixing of waste, and the use of air in blowing the waste from mill to baler would remove quite a bit of trash, and it is possible that the waste would bring a higher price on the market.

CONTRIBUTOR NO. 8301

Size of Copper Rolls on Slasher

EDITOR TEXTILE INDUSTRIES:

I would like to know if the copper rolls on the slasher back and front should be the same size, or should the front roll be a fraction of an inch smaller than the back roll in order to avoid stretch between these rolls.

At the present time the front copper roll on my slasher is 1/16 of an inch smaller in diameter than the back roll.

If the front roll should be smaller, how much smaller should it be? When I say front roll, I mean the roll next to the cylinder; the back roll is next to the creel.

CONTRIBUTOR NO. 8291

Editor's Note: In order to be of immediate service to the reader, this question was answered prior to publication. The solicited information is published here along with the question. Other opinions are invited.

EDITOR TEXTILE INDUSTRIES:

We believe CONTRIBUTOR NO. 8291 is doing the proper thing by having his front roll slightly smaller than his back roll. (If ne wants to avoid explaining which is

Only genuine RIDGID guarantees economy

If this Housing ever Breaks or Distorts we will replace it Free
RIDGID
HEAVY DUTY
This Work-Saver RIDGID assures you..."No pipe wrench housing repair expense."

• You'll find no substitute for the smart-working long-lasting qualities that have made the RIDGID the world's most popular pipe wrench. Breakproof housing, full-floating hookjaw with handy pipe scale, replaceable heeljaw, adjusting nut that spins easily in all sizes, 6" to 60", comfort-grip handle —these plus the RIDGID name mean more service and tool satisfaction for your money. Buy at your Supply House.

RIDGID
★ Work-Saver Pipe Tools ★

You Can't Afford to Ignore These EXPANDER Facts

Send for BULLETIN ECI Now!

Here are some of the subjects covered in this new 6-page bulletin:—

Mount Hope Sealed End Expander
Mount Hope Batcher Expander (Counterweight and Spring Type)
Mount Hope Adjustable Expander
Mount Hope Expander for Tire Cord Fabrics
Single, Double and Triple Brackets
Bar Mounted Brackets
Flange Brackets

All Mount Hope Expanders are "free-wheeling," i.e. with ball bearing mounted Neoprene sleeves. Minimum tension on the warp, which is pulled over the sleeve, greatly increases the spreading effect of the expander and increases the life of the Neoprene surface.

Other advantages are listed in BULLETIN E. C. I. *Send for your copy today.*

MOUNT HOPE MACHINERY CO.
15 Fifth Street, Taunton, Mass., U. S. A.

Mount Hope Free-Wheeling EXPANDER

in card clothing, too..

size and shape are important

Whether you need card clothing with round, angular or convex wire, you can be sure that the staples in Wissco Card and Napper Clothing will be accurate and uniform in size and shape. And that's mighty important if cards are to yield maximum production.

Because Wissco Card and Napper Clothing is built beyond the requirements of average service, it is being relied upon by a steadily growing number of boss carders. A test run on your own machines will prove our claims. Why not write today for detailed information and prices.

Sales Office and Plant: 56 Sterling St., Clinton, Mass.
Executive Office: 500 Fifth Avenue, New York 18, N. Y.
District Offices: Atlanta, Boston, Buffalo, Chicago, Detroit, Denver, New York, Philadelphia.
Pacific Coast: The California Wire Cloth Corporation, Oakland 6, Cal.

Wissco CARD AND NAPPER CLOTHING

FOR COTTON, RAYON, WOOL, WORSTED, ASBESTOS AND SPECIALTIES

CF&I

A Product of Wickwire Spencer Steel Division of The Colorado Fuel And Iron Corporation

which, he can call it a "finishing roll".)

Due to the fact that there is some slippage on the smooth size-wetted surfaces of the copper rolls, this problem is not as important as it might seem at first glance. The slippage tends to equalize excesses in tension on either roll, which is why this problem does not come up more often. (Since the squeeze rolls ride on the yarn, they will not affect this question.)

We believe 1/16" is more difference than is needed. This makes a difference of nearly one per cent in the circumference of the two rolls. We would rather see about 1/64" or 1/32" at the most. However, if CONTRIBUTOR No. 8291 is not getting rolling of his yarns between the copper rolls, he need not worry. Rolling would be a definite indication of too much difference between the roll diameters.

Due to the possibility of getting the back roll and the finishing roll reversed, some mills prefer to maintain equal diameters. Since most of the shrinkage of the yarns due to wetting probably occurs before they go through the nip of the back roll, and slippage can take care of the rest, this is also satisfactory.

In short, unless CONTRIBUTOR No. 8291 is having trouble with either excess starch or rolled ends, he should be able to operate all right either way.

CONTRIBUTOR No. 8293

◆

EDITOR TEXTILE INDUSTRIES:

It is our opinion that the diameter of both the finishing and squeeze rolls should be the same. We know of several instances where mills have varied the diameter of these rolls by 1/16 of an inch in order to eliminate the stretch of the wet warp sheet over the 27 inches between rolls; also, mills utilizing coarse yarns have been known to have the front or finishing roll 1/16 of an inch smaller than the squeeze roll to put tension at the nip of the finishing roll so as to improve the dressing of the wet-sized warp sheet.

Most of the mills that have conducted tests on this subject have come to the conclusion that there is no advantage to be gained in either direction, and that as long as the two roll diameters are kept exactly the same there is little to be gained from the standpoint of eliminating stretch or improving the dressing at the finishing roll.

CONTRIBUTOR No. 8295

Crooked Seams on F-F Hosiery

Subject Briefed: *We find that some of our finished full-fashioned hose have crooked seams.* (CONTRIBUTOR No. 8328, *October*, 1950).

(In order to serve Contributor No. 8328 without delay, the editors forwarded his request to a mill man for any suggestions he might have on the subject. His reply is presented here. Others are invited to submit their opinions.)

Editor, TEXTILE INDUSTRIES:

A primary source of crooked seams is stockings running one-sided or uneven on the full-fashioned machine; it is brought about by the stocking knitting tight on one side and loose on the other.

This situation can be remedied by proper adjustment of the tension on the knitting yarn. The needle bars must be started evenly on each side when a new set is started; otherwise the stockings will pull one-sided as they increase in length. The jack heads and sinker heads must also be even; especially is this the case with the jack heads. Since the position of the sinker head is fixed,

Are You Getting a Fair Day's Work for a Fair Day's Pay?

As Production Engineers we specialize in the utilization of

LABOR — EQUIPMENT — MATERIAL

Our list of clients reads like the Blue Book of American Manufacture, and in our files are many expressions as to our service and results accomplished, like the following:

"They qualified in every way on their estimate of what they would accomplish in the way of savings and better labor control.

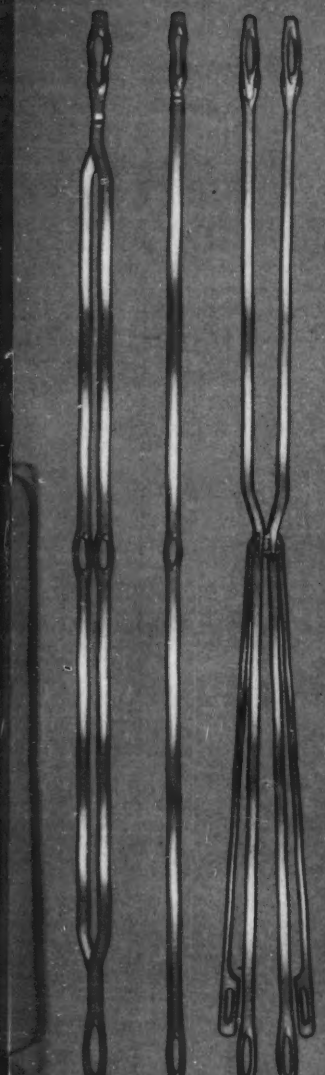
A SYNTHETIC PLANT

Write for a free copy of "Labor and Management Benefit by Industrial Engineering Principles."

AMERICAN ASSOCIATED CONSULTANTS, Inc.

D. S. KEOGH, President — H. B. CRAFT, Vice President
J. J. SKELLY, Vice Pres. and Gen. Mgr. — in Charge of Southern Operations

250 PARK AVENUE, NEW YORK 17, N. Y. — GRANT BUILDING, PITTSBURGH, PA. — 30 CAMDEN ROAD, ATLANTA, GA.



STEHEDCO High Carbon and Stainless Flat Steel Heddles with the finest finish and polish and especially designed warp eye, are obtainable in all sizes and all types for every known warp yarn.

trouble is not likely to develop here.

When uneven stockings reach the seaming department, good seamers can sometimes make straight seams on them. On the other hand, a careless seamer may make crooked seams on stockings that are properly knitted.

CONTRIBUTOR No. 8329

Reader Comments on Neppy Cotton

EDITOR TEXTILE INDUSTRIES:

I should like to comment on neps in an effort to help someone. Neppy cotton is particularly noticeable in some grades of manufactured goods, especially blue goods. I think that many neps are made at the gin, and many are manufactured on high speed dull beaters. Trying to build laps too fast with insufficient picking machinery to produce pounds required also produces neps. Sometimes too much oil spray adds to the trouble, but the worst offender is dull card wire.

Lack of cards and having to overload them to obtain the desired production contributes to the difficulty. Fast doffer speeds help produce bad work. A cylinder speed of 165 to 170 rpm is sufficient with a doffer speed of 8 to 9 rpm. Licker-in speed should be about 425 rpm. It is money saved to have an ample number of cards, and with good sharp card clothing there should be less neps manufactured.

Slick, dull points on any part of the card will make neps, especially if the card is overloaded. There is no other machine in a mill as important as a card in processing fibers. Dull card wire will not make yarn without neps. All the card settings and all speeds may be perfect on the card, but if the wire does not have a sharp point, neps will be produced. Don't just set grinder rollers and forget them; if the grinders are covered with good sharp emery fillet and allowed to run three or four hours, the points of the wire should be sharp, but if they aren't, the grinders should be lowered a bit before continuing the grinding operation.

Occasionally it is advisable to use a stiff brush to clean the emery fillet; then examine it to see that oil has not penetrated the shell and become caked in the pores on the fillet. When examining the fillet, the roll should not be turned backward against the card wire. The emery fillet should be kept dry and clean, but it is not economical to use worn fillet. The objective is to make the wire sharp and in condition to card the neps out of the stock.

It is my opinion that a stripper roll will make card wire dull. A yard of lap will make many yards of drawing on a card. The thousands of wire points that act on the stock to put it in sliver form will roll the fibers into knots and neps if the wire is dull. It is better to have sharp card wire with flats set on 12 than to have dull wire set on 10. Sharp wire points and good settings are both critical in good carding, but the wire does the carding and should be kept sharp to do the job.

CONTRIBUTOR No. 8289

Effect of Change in Staple Length on Sheeting Yarn

Question Briefed: *Mill is considering using* **15/16"** *Strict Low Middling cotton instead of* 1 1/16" *Strict Low Middling in the manufacture of sheeting in which* **22s** *warp and filling yarns are employed. What will be the effect on tensile strength and appearance of the fabric?* (CONTRIBUTOR No. 8201, *September* 1949)

EDITOR TEXTILE INDUSTRIES:

There should be a reduction in breaking strength with shorter staple cotton. We also think evenness would be more difficult to control.

CONTRIBUTOR No. 8325

and Southern

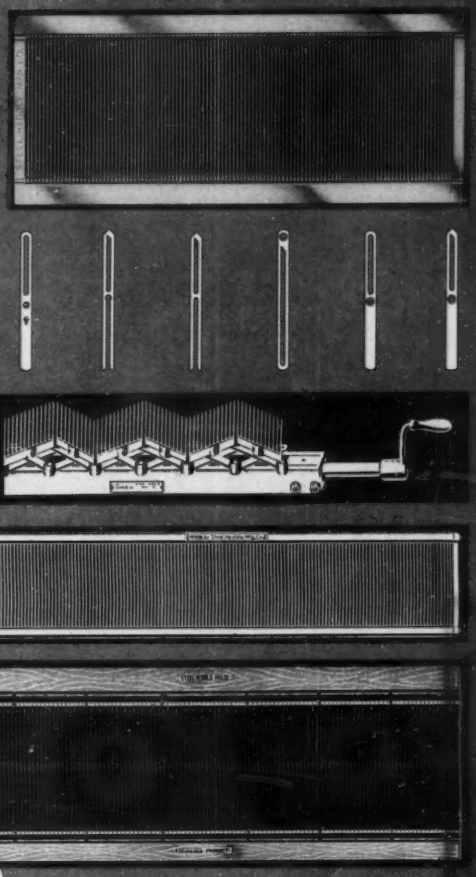
Stehedco and Southern!
BRANDS THAT MEAN PROTECTION FROM WARPER BEAM TO CLOTH ROLL

100 times out of 100, during the weaving process, warp yarn touches metal while travelling from Warper Beam to Cloth Roll. Susceptible to chafing, jagging, and marking, yarn requires equipment of the most superior design, raw material, finish and polish to eliminate the costly breakage that can only result in the risk of 'Seconds' or 'Rejects'.

Top quality runs . . . Firsts can only be assured by using top quality loom harness equipment. Preferred by nine out of ten mills, STEHEDCO and SOUTHERN with their years of research and experience have made it possible to TRAVEL YOUR YARN FROM WARPER BEAM TO CLOTH ROLL WITH THE FULLEST POSSIBLE PROTECTION ATTAINABLE TODAY.

SERVICE . . . from five large strategically located plants, engineering staffs and mill trained field representatives conversant with mill problems and understanding the importance of equipment and product performance are ready to serve you . . . just phone, write, or wire.

THEY WEAVE THE WORLD'S NEEDS



Ste Hed Co
Flat Steel Heddles
Loom Harness Frames
Loom Reeds
(Pitch Band and All Metal,
Regular and Stainless Steel Wire)
Loom Harness Accessories
Southern Shuttles
(Tempered Dogwood,
Fibre and Persimmon Covered)
Drop Wires
Warp Preparation Equipment
Electrode Rods
(Fibre and Plastic Insulation)
Creel Stop Motions
Hard Chrome Plated Parts
"Weaves the
World's Needs"

2100 W. ALLEGHENY AVENUE PHILADELPHIA 32, PA.

Other Offices and Plants

Greenville, S. C. • Atlanta, Ga. • Greensboro, N. C. • Providence, R. I.

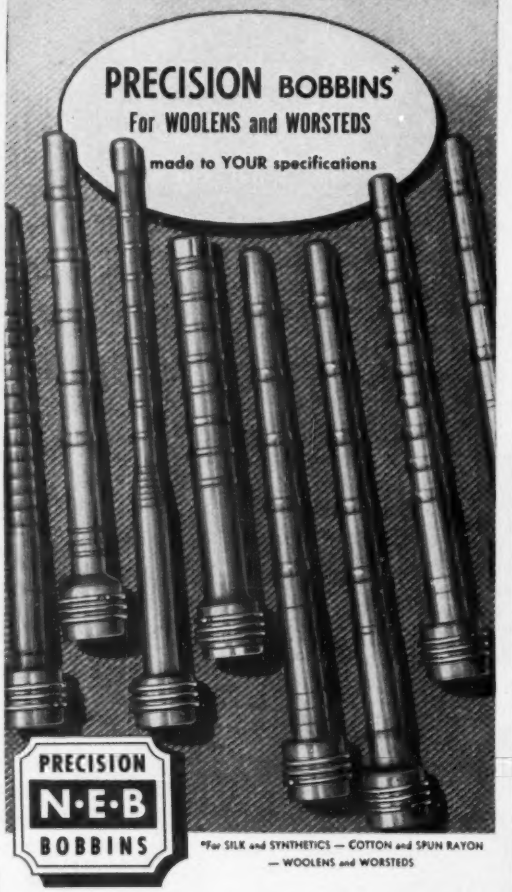
Paris Plant . . . Greenville, S. C.

A Division of STEEL HEDDLE MFG. CO.

310 St. Hubert Street Granby, Quebec, Canada

For WOOLENS and WORSTEDS

NEB PRECISION Automatic Loom Bobbins for woolens and worsteds are precision-engineered to *your* requirements . . . give smooth-operating, waste-reducing, trouble-free performance . . . in "Hard-Oil" finish for ordinary use . . . NEB Baked Enamel long-lasting finish for severe conditioning . . . try NEB PRECISION-Engineered Bobbins on *your* looms — and compare!



*For SILK and SYNTHETICS — COTTON and SPUN RAYON — WOOLENS and WORSTEDS

Precisioned to Size — Precisioned for Concentricity
Precisioned for YOUR Spindles . . .

★

NEW ENGLAND BOBBIN & SHUTTLE CO.

Makers of PRECISION *Automatic Loom Bobbins*
NASHUA, NEW HAMPSHIRE

Representatives:

HENRY H. HERSEY, Norwood Place, Greenville, S. C.
HARRIS MFG. COMPANY, 443 Stonewall St., S. W., P. O. Box 1982, Atlanta, Ga.
H. W. CURTIS, 735 W. Crescent Ave., Allendale, N. J.
THE CHARLOTTE SUPPLY CO., Charlotte, N. C.

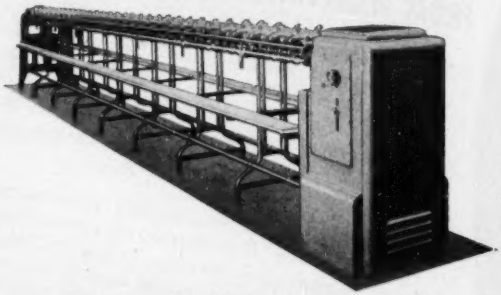
Export Agents
VANDERBURGH & CO., INC., 25 Beaver Street, New York 4, N. Y.
HARRIS & UNDERHILL, 446 Statler Building, Boston, Mass.

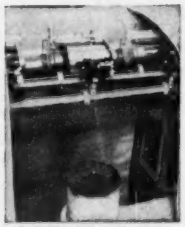
Entirely New

SIPP-EASTWOOD WINDER-REDRAW

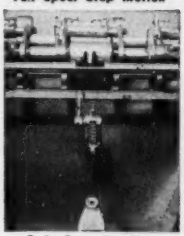
WITH SELF-THREADING TENSION—SELF-OPENING SPINDLELESS ATTACHMENT—FULL SPOOL STOP MOTION.

Deliberately designed for perfect spools at higher speeds and greatest possible automatic operation.




Self-Threading Tension

Full Spool Stop Motion


Gate Type Tension

This brand new winder-redraw requires a minimum of attention during operation and is easy to clean and maintain.

Features:

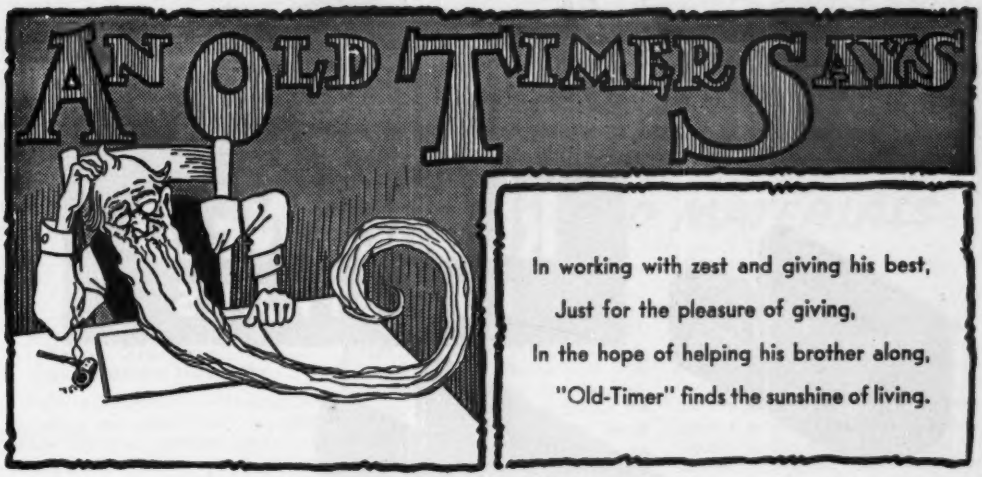
1. **Washer type self-threading tension** fastened to traverse rail is easily adjustable and quickly cleaned. Eliminates all threading operations.
2. **Gate type tensions** available with self-threading Alsimag guides for nylon.
3. **Full spool stop motion** prevents overrun bobbins.
4. The drive and traverse mechanism is enclosed in one complete unit and is lubricated by a circulating oil bath.
5. Traverse adjustment is independent on each side of machine and can be adjusted from 3½" to 7" traverse without changing cam.
6. Speed changes are readily accomplished through the use of a handwheel.
7. Winds per stroke easily adjustable.
8. Single or double drive self-opening spindleless brackets are available.
9. Easily changed for "S" or "Z" twist by use of reversing switch.
10. Tachometer available for easy speed readings.

Write for descriptive folder.

SIPP-EASTWOOD CORPORATION

Producers of superior equipment for textile processing
45 Keen Street, Paterson, New Jersey

IT'S A SIPP EASTWOOD


AN OLD TIMER SAYS
In working with zest and giving his best,
Just for the pleasure of giving,
In the hope of helping his brother along,
"Old-Timer" finds the sunshine of living.

Random Thoughts

Criticism. That is a nasty word to begin with. We never did like it, and the more we come in contact with criticism in all of its ramifications, the more we are convinced that the great majority of textile operating executives don't realize that they do not know how to use it in an administrative way. Just remember, fellows, criticism is pretty easy to give, but darned hard to take.

Of course, most intelligent men know that criticism is valuable to them, but that doesn't mean that they like it. It is just not human nature for a person to *like* criticism.

Criticism is deflating to our ego, and any deflation to our ego causes inner resentment or dislike. Criticism may be compared to going to the dentist. Even though you ask the dentist to fill or pull your tooth, you don't like it.

All reasonably thinking men realize this reasoning, but it is a small percentage who profit by it in their criticism of their employees—their assistants, and even their own families. Many overseers and superintendents burst out with criticism without giving the matter any thought beforehand. Then later they realize their mistake.

We could go on and on in discussing this subject but will sign off by giving you one, and one only, idea which OLD-TIMER has found is pretty good.

Make a sandwich of your criticism. That is, begin by saying something complimentary about the fellow's work or his family. Then get in your criticism—hard if it deserves it, but follow up with something encouraging, about the ability you feel sure he has for his future work.

Yea, a "sandwich criticism" often brings very good results.

Inspiration. Have you the ability (or I should probably say the intelligence) to inspire your assistants, your section men, and employees with a determination to do a better job, to get more production with less seconds?

We once read something like this about a great leader:

"His capacity to inspire and encourage those who had to do tough and seemingly impossible jobs was marvelous, and we came away from the conference feeling better, not because he had solved our problems or even given us a clear direction to follow, but because he had made us feel more cheerful, stronger, more determined to do what he had shown us clearly was our job and not his. It wasn't so much what he said as the spirit he conveyed."

There, gentlemen, is an important item on leadership.

Why Do People Prefer White Collar Jobs? It is a psychological fact, or should we say a fact of human nature, that some people will work harder for social standing than for money. That is, most young ladies would prefer a stenographer's job at $25 per week than a set of looms at $35 per week.

Operating executives who can get employees to feel that they have an important job will far out-class the executive who does not use his imagination.

announcing the New

"VERYBEST" RUBBERWELD LUG STRAPS

- **UNIFORMITY**
  PROVIDES UNVARYING PICK ACTION
- **HIGH QUALITY ARMY DUCK**
  CONSTRUCTION GIVES EXTRA STRENGTH
- **EXTRA-DURABLE**
  PLUG OR HEEL REDUCES ADJUSTMENTS
- **MOLDED AS ONE PIECE**
  ENTIRELY, INCLUDING PLUG
- **NO RIVETS**
  OR PARTS TO WORK LOOSE
- **NO PERMANENT STRETCH**
  — RESISTS OILS — NOT AFFECTED BY HUMIDITY

Made entirely of rubberized cotton fabric
More uniform
than any other lug strap!

Samples available

Northern Division
DANIELSON, CONNECTICUT
Southern Division
CHARLOTTE, NORTH CAROLINA

NEW Equipment AND MATERIALS

Arealometer for Fiber Fineness and Cotton Maturity

The Arealometer is described as a precise instrument which measures fiber fineness (specific area) and shape from which may be calculated the weight per unit length and the perimeter. These factors are determined by measuring the resistance a given mass of fiber offers (under different conditions) to the flow of air.

The sample of specified mass is placed in a chamber and compressed until its resistance to the flow of air is equal to a standard resistance. The fineness is then read off a direct reading scale.

By making this same measurement at a different compression a different reading is obtained if the fibers are other than round. The difference in these two readings is then an indication of fiber ellipticity or cotton immaturity.

Since it is essential that the samples measured in the Arealometer be of a definite weight which depends only on the sample material, a number of accessories have been developed to expedite sample preparation. A balance for weighing the sample is required, and the Model 143 Comparison Balance shown in the accompanying photo is recommended. With the exception of the balance all of the accessories described are furnished with the Arealometer.

The comparison balance is designed for the rapid weighing of small samples and is particularly well adapted for fibrous materials such as cotton or wool.

It consists of a beam supported on torsion springs with an aluminum vane on one end and a stainless steel needle on the other. This assembly is suitably housed in a case provided with a large window and an opening so that the sample may be readily placed in position and readings taken without interference from air currents or the operator's breath.

The vane operates in the field of an Alnico magnet which rapidly damps any oscillations. The clinging properties of fibrous material make the needle, which is mounted horizontally and at right angles to the beam, a convenient means of attaching the sample while maintaining its center of gravity at the proper point. The opposite end of the needle serves as a balance indicator.

Special Instruments Laboratory, Inc., 1003 Highland Ave., Knoxville, Tenn.

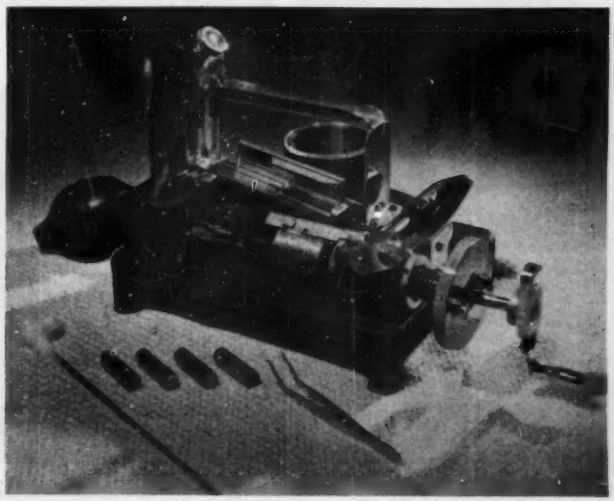
For additional data, request item B-103, using business reply card on page 242.

Check Strap Features Divided Wear Between Top and Bottom Edges

The Zephyr check strap recently placed on the market embodies a principle that is said to be entirely new—it presents alternately its top and bottom edges to the picker stick, resulting in smooth, accurate boxing

THE AREALOMETER for measuring fiber fineness and shape is shown in the photo at the right.

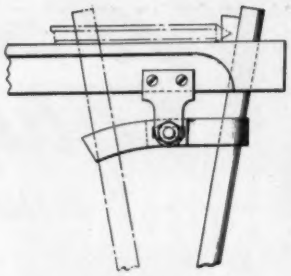
ACCURATE WEIGHING of samples is required. The Model 143 Comparison Balance pictured below is recommended for this purpose. (Special Instruments Laboratory).



of the shuttle, long strap life, and freedom from frequent adjustments, according to the manufacturer.

As shown in the accompanying illustration, the strap is made straight for one half its length while the other half is curved to such a degree that the resulting angle, when the strap is looped around the picker stick, is greater than the angle of the stick when approaching the end of its stroke. By alternating the wear between the top and bottom edges, the tendency to stretch is on the diagonal across the face of the strap, it is said.

On the power stroke the bottom edge of the strap is presented to the picker stick, producing less wear. This is due partly to the fact that the curved end of the strap allows it to drop lower on the picker stick, resulting in much less impact and consequently less generation of heat.



Wear is divided between top and bottom edges on this "Zephyr" check strap.

By using the straight end of the strap for checking, the point of contact of the strap and the stick is maintained as near the shuttle as possible, thus eliminating any lever action present.

Since the points of contact are high on the check stroke and low on the power stroke when the Zephyr check strap is employed, full resiliency of the leather is utilized under conditions ideal for long life with a minimum of attention, according to the manufacturer.

Zephyr Check Strap Corp., P. O. Box 3090, Charlotte, N. C.

For additional data, request item B-301, using business reply card on page 242.

A.S.T.M. Standards on Textile Materials

The October 1950 edition of this compilation includes in their latest form 90 specifications, test methods, and tolerances developed by ASTM Committee D-13 on Textile Materials. Considerable other related material is given.

New standards include tests for vegetable matter in scoured wool, snag resistance of hosiery, resistance of pile floor coverings to insect pest damage, bonded fabrics, magnetic

Repair for Light Weight Heddles

A modified use of the recently developed Walker Lock-on Heddle Repair permits fast, permanent repair of very light weight heddles having no swedge shoulders, such as silk and rayon types for .015 x 5/16 silk rods and .032 x 5/16 rods.

The same repair head is used as is required for the repair of conventional heddles having swedge shoulders. The difference, however, is in the cutting and treatment of the broken top loop. Photograph A shows the location for breaking the heddle wire, about an eighth of an inch or more above the top loop, leaving two small prongs as shown in picture B. The Lock-on Repair is inserted over the heddle wire and the prongs bent down as shown in photo B.

Photo C shows the bending of the prongs, and D the clinching.

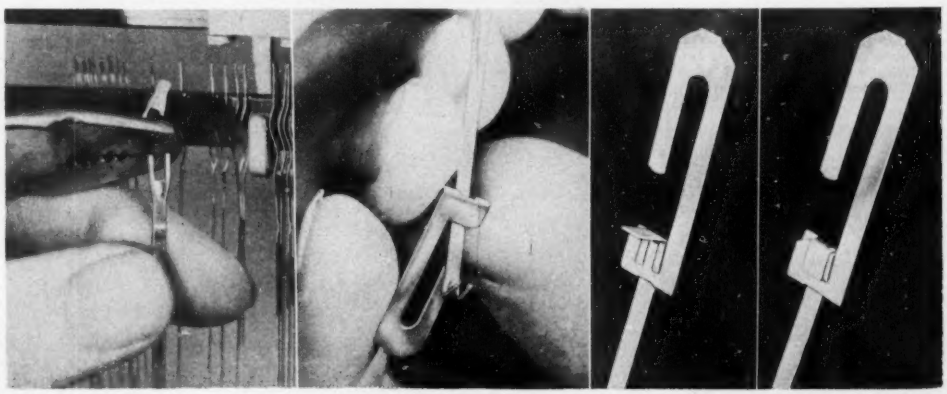
Repairs are possible in both top and bottom loops without disturbing the warp. The same finished length of repaired heddle is provided as in the original heddle.

It is claimed that down time for heddle repairs is cut to less than one-third of that required with conventional heddle repairs.

Walker Manufacturing Company, Atlantic & Ruth Streets, Philadelphia 34, Pa.

For additional data, request item B-102, using business reply card on page 242.

A B C D



AHCOVAT DYES

High on the list of today's outstanding vat dyes is the large family of AHCOVAT DYES . . . quality dyes that do a quality job!

✳ FLAVONE GC

An anthraquinone vat dye which will produce bright greenish-yellow shades with a superior fastness to light. This AHCOVAT dye has excellent fastness to kier boiling and bleaching. AHCOVAT FLAVONE GC works extremely well with AHCOVAT Jade Green in producing yellowish-green shades.

Ask for complete technical information and shade card.

ARNOLD, HOFFMAN PROVIDENCE RHODE ISLAND

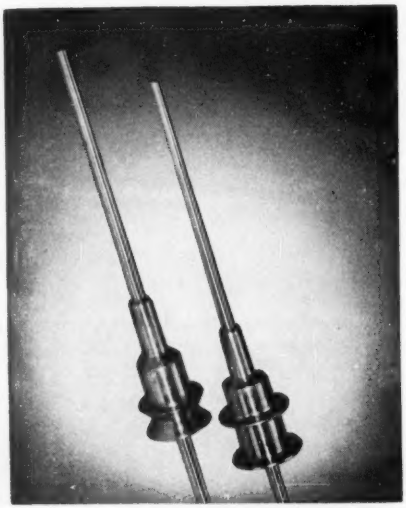
Associated with
Imperial Chemical Industries, Ltd.
(DYESTUFFS DIVISION)
England

ARNOLD, HOFFMAN & CO., INCORPORATED • EST. 1815 • PROVIDENCE, R. I.
Offices: Charlotte, Cincinnati, New York, Philadelphia, Providence
Plants: Charlotte, N. C. Cincinnati, Ohio Dighton, Mass.

New Fluted Rolls

Now Available at Substantial Savings

New automatic machinery recently installed makes it possible for Southern Spindle and Flyer Co. to manufacture FLUTED ROLLS for spinning and flyer frames at LOWER costs. We pass these savings on to you.
Compare our prices for all types of NEW fluted rolls with the cost of reworking OLD rolls. You'll be pleasantly surprised at the very small difference in cost.
All of our new fluted rolls are made with screw necks. They're precision made of the highest grade steel and are held to close tolerances. They can be finished also with hard chrome plating.



New England Representative
WM. R. FOX
P. O. Box 380 — Providence, R. I.

WHORLS

- Band and tape drive
- Precision made
- Made to specifications
- Guaranteed

SPINDLES

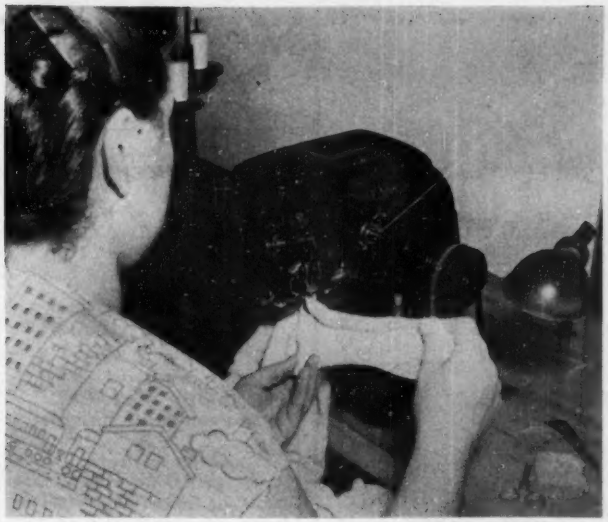
- Retopped by electric butt welding or tops built up with chrome and reground to size
- Pointed, polished, straightened — as good as new
- All spindles tested for straightness and accuracy at running speeds

PROMPT DELIVERIES AVAILABLE
Write, wire or phone for further information

50TH ANNIVERSARY OF SERVICE TO THE TEXTILE INDUSTRY

Southern SPINDLE & FLYER COMPANY

821 West First Street • Phone 2-1329 • Charlotte 1, N. C.



Full-fashioned sweater seaming machine (Union Special).

rating of asbestos used for electrical purposes; also new specifications for mechanical sheet felt.

There are appendices covering basic properties of textile fibers, a psychrometric table for relative humidity, and a yarn number conversion table. Also, proposed methods of test cover evaluation of properties related to the hand of soft-finished woven fabrics, accelerated ageing of textiles, estimating the clean wool content in wool in the grease, and fire-retardant properties of treated felt. Two other appendices cover proposed recommended practices for calculating number of tests to be specified in determining average quality of a textile material and for designation of yarn construction.

Copies of this 584-page book, heavy paper cover, can be obtained from American Society for Testing Materials, 1916 Race Street, Philadelphia 3, Pa., at $4.50 each.

Variable Height Weir for "Laxloop" Continuous Washer

A new variable height weir for the Riggs & Lombard "Laxloop" continuous washer, is part of a system designed to assure a positive counter-current flow of liquor, with uniform predetermined level, in each tub.

Each tub is equipped with a variable height weir, and all liquor which flows over this weir is pumped to the preceding tub by a stainless steel, flooded suction, low-head type pump. Thus it is possible to maintain proper operating level in each and every tub while maintaining maximum counter-current flow of liquor.

Riggs & Lombard, Inc., Lowell, Mass.

For additional data, request item B-106, using business reply card on page 242.

New Machine for Seaming Full-Fashioned Sweaters

A seaming machine said to be specially designed for manufacturers of high quality full-fashioned sweaters and similar garments such as infants' knit jackets and sweaters, is designated Style 41300XZ.

The new cup feed machine produces stitch Type 101. It is equipped with an uncurling device to remove the curl from the edges of the fabric as the garment is being seamed. Also, this uncurling device acts as a guide for maintaining a uniform depth of seam and is adjustable for various depths of margins, depending upon

MILTON
A TIME TESTED LINE
Engineered for Production
MILTON WARP BEAMS
for BROAD, NARROW FABRIC, RIBBON, VELVET, CARPET LOOMS

BROADLOOM BEAMS

For C & K Looms (pictured) and Draper Looms (with let-off gear). Steel barrels, cast iron flanges.

RIBBON LOOM BEAMS

Steel barrels, with your choice of adjustable head and fixed shaft (pictured) or fixed head with removable shaft.

Write for Catalog 45 (Steel) or Catalog 45-A (Light Metal)

GET THE COMPLETE STORY

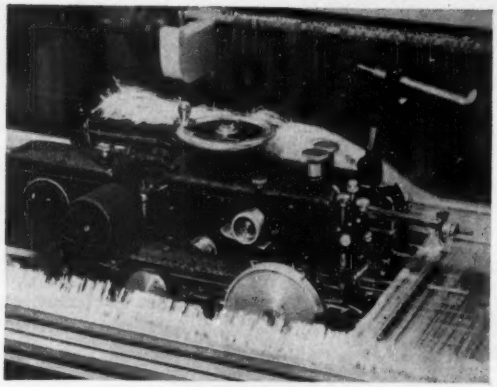
MILTON MACHINE WORKS, INC.
DESIGNERS • ENGINEERS • MANUFACTURERS
MILTON, PENNA.

AN OUTSTANDING SUCCESS

TITAN

WHEREVER USED

TITAN *Automatic* WARP TYING Machine



INCREASES PRODUCTION — CUTS COSTS

- Ties warps with and without lease.
- Ties leased warps to unleased warps.
- Ties full width of any warp in one continuous operation.
- Ties 6,000 to 18,000 knots per hour.
- Precision machine is simple to operate—flexible, foolproof and adaptable to a wide range of yarns.
- Driving mechanism is completely enclosed—dust free.
- May be used as a portable unit, or for stationary tying.

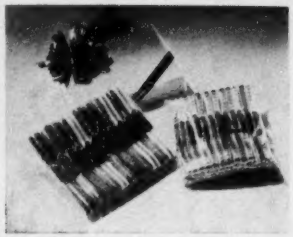
Send for our descriptive, illustrated Bulletin T-1

EDDA INTERNATIONAL CORP.

468 FOURTH AVE. **NEW YORK CITY**

U. S. General Sales Agents

NEW Equipment AND MATERIALS



Packaging Material Serves Dual Purpose

To prevent rayon and silver tinsel gift tying ribbon from tarnishing during the interval between its manufacture and its use by a consumer, Royal Swan, Inc. (Ribbon Division of Burlington Mills) uses Shellene, a controlled extrusion of polyethylene, for packaging, according to Shellmar Products Corp., manufacturers of the transparent material.

Fabricated in pouches, in two convenient sizes, Shellene not only protects the tinsel from tarnish but also serves as an attractive package for display purposes.

Packaging is accomplished by packing three dozen hanks in a template and inserting them by hand in a Shellene pouch. Pouch is then heat-sealed.

Shellmar Products Corp., Mount Vernon, Ohio.

For additional data, request item B-108, using business reply card on page 242.

the condition of the edges of the fabric.

Union Special Machine Co., Chicago, Ill.

For additional data, request item B-101, using business reply card on page 242.

Stainless Steel Dye House Truck

The bottom of a new stainless steel dyehouse truck is higher in the center than on the sides, to facilitate the flow of the draining fluid through the side openings. The sides and ends of the truck are reinforced with separate ribs of

stainless steel for greater strength. The top edge is also reinforced, and rubber bumpers are furnished on the ends.

The truck is easy to keep clean, the manufacturer claims, and its use results in excellent quality control of fabrics.

Wheels are made of cushion rubber and have roller bearings.

Market Forge Company, 25 Garvey Street, Everett 49, Mass.

For additional data, request item B-105, using business reply card on page 242.

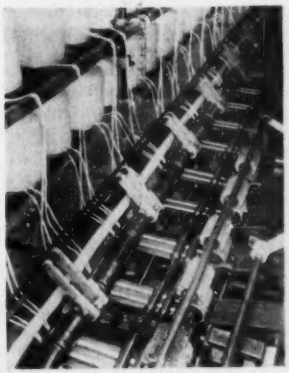
High Draft System for Porcupine Drawing Frames

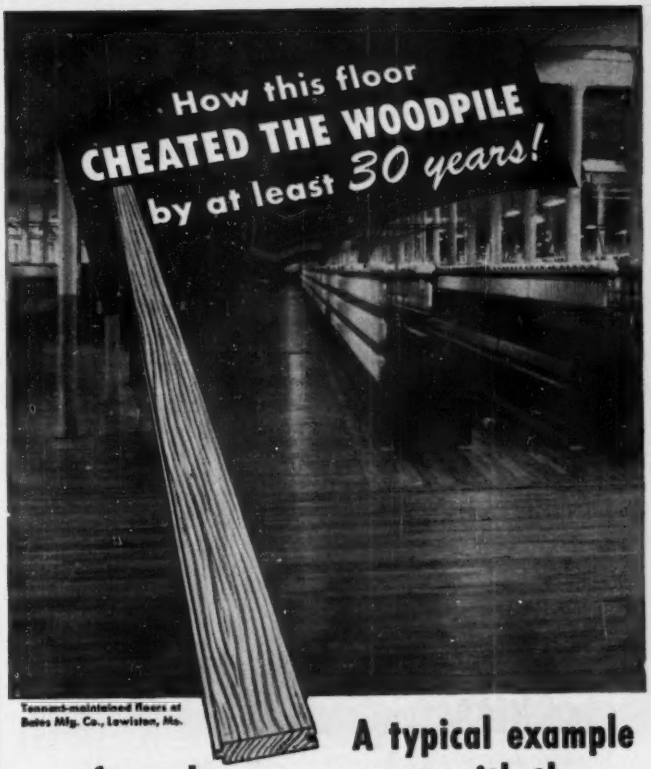
Textile Machines S.P.A.—Isotta Fraschini have recently developed a new "Superdraft" for porcupine drawing frames (patent Stellite—Peuto pending) for French and Continental spinning.

This development, according to the announcement, has proved to be outstanding and considerably improves the operation of porcupine drawing frames. Roving is transported by aprons, which makes it possible to increase drafts by more than 50% and to apply higher speeds.

The new draft arrangement can be supplied either with new machines or as individual units for any other make of porcupines. Advantages

New drafting system for porcupine drawing frames (Stellite American).





Tennant-maintained floors at Bates Mfg. Co., Lewiston, Me.

A typical example of results you can get with the...

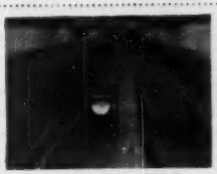
TENNANT FLOOR MAINTENANCE SYSTEM

Transformed like magic, this 30-year-old floor —once dark, rough and spongy from scrubbing—is now good for another 30 years. Saved from costly, premature replacement, it's been made bright, smooth and durable again—by low-cost reconditioning with the TENNANT System.

RECONDITIONS your floors. Gets rid of dark, rough, oil-soaked fibers . . . provides a smooth, bright, new-wood surface.

HARDENS floor surface by special sealing process . . . fills, binds and toughens fibers to resist dirt penetration.

DRY CLEANS; ends scrubbing! Avoids muss, saves manhours, reduces accidents . . . assures cleaner floors at LESS COST!



YOUR FLOORS STAY CLEAN longer when dry-cleaned instead of scrubbed! With this Tennant Floor Machine, dirt, grime and traffic stains are whisked off and picked up in 1 operation. Leaves smooth, hard, dirt-resistant surface . . . only daily care needed is fast, easy sweeping with dry cotton mop. No muss; easy to use; keeps floors looking like new.

- Reduces floor cleaning costs.
- Makes floors easy to clean.
- Prolongs floor life, aids safety.

G. H. TENNANT CO.
2524 North 2nd Street
Minneapolis 11, Minnesota

Write today! Ask for "New Floors From Old" article, also "Textile Floor Maintenance" bulletin, etc.

NEW Equipment AND MATERIALS

claimed are as follows:

1. Draft increase from average 4 - 4.3 to 6½ and 7, and in special cases where long wools are processed, up to 10.

2. The processing speeds can be increased by approximately 20% up to around 31 yards per minute.

3. The sliver breakages are reduced and the waste cut down.

4. The device assures quality improvements.

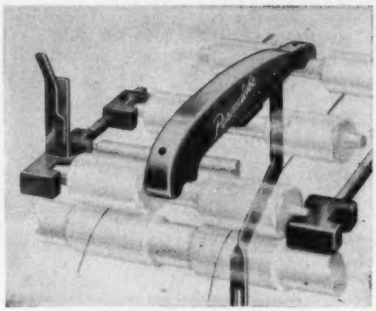
5. Through increased draft at least one drawing operation can be eliminated.

Stellite American Corp., 60 East 42nd St., New York 17, N. Y.

For additional data, request item B-104, using business reply card on page 242.

Better Service at Lower Cost

with WHITEHEAD *Permalube* OILLESS BEARING SADDLES and NEBS



Now your mill can use Whitehead Permalube Saddles and Nebs at a first cost that is usually less than for old-fashioned iron saddles and nebs. There never has been a comparison of second costs, for Whitehead Permalube Saddles and Nebs eliminate oil from rolls and yarn, reduce cleaning, won't score the rolls, can't cock or wander. You can install them and forget them.

Over 500,000 Spindles Now Equipped With These SELF-OILING Products

The new, improved Whitehead Saddles are being used in over 150 mills on more than half a million spindles. More and more mills are changing systematically to Whitehead Permalube assemblies exclusively.

Only Whitehead Permalube Products Offer These Money-Saving Features

- Years of trouble-free service
- No oiling of Permalube—Infrequent oiling of Oilite.
- No oil on yarn from top rolls
- Less lint accumulation
- Easier picking—less often
- Very low friction coefficient
- Aluminum bearing holders won't score rolls
- Pivot point permanently adjusted
- Saddle self-aligning. No tilting
- Bearings quickly replaced if ever necessary for only 3c to 5c each

NEW! BRONZE OILITE INSERTS IN PERMALUBE

Now furnished as standard in front saddle and neb bearings.

Solid Bronze Oilite front saddle bearing is also available for extra heavy loads and scored roll necks. (This requires a few drops of oil every few months.)

We have Saddles and Nebs for most all forms of drafting and invite you to

TRY THEM FREE!

Send us a right-hand and center neb and a saddle of the types you are now using and indicate the number you need for one side of your most troublesome frame. We will furnish a complete set of nebs and saddles for one side absolutely free of charge or obligation. But we warn you—once you've tried Whitehead Permalube Saddles and Nebs, you'll want them on all your frames.

Prompt Delivery from Ample Stocks

PATENTED AND MANUFACTURED BY
WHITEHEAD ENGINEERING CO.
522 WEST PEACHTREE STREET, N.W.
ATLANTA 3, GEORGIA

EXCLUSIVE DISTRIBUTORS
Meadows Manufacturing Co.
BOX 4354 • ATLANTA, GEORGIA

• SEE YOUR MEADOWS MAN

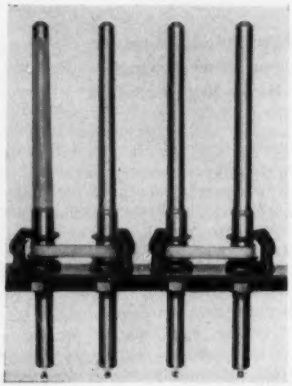
SOUTH CAROLINA
J. P. Coleman, Box 1351, Greenville, S. C.
NORTH CAROLINA
Walter Coleman, Box 782, Salisbury, N. C.
NORTHERN REPRESENTATIVE
Matthews Equipment Co., 83A Broadway, Providence, R. I.
ALABAMA, GEORGIA, MISSISSIPPI
Sam Hogg, Box 4354, Atlanta, Ga.

All-Steel Top for McMullan Spindles

Design of spindles for use with paper tubes has been changed at Saco-Lowell Shops. A steel sleeve has been adopted in place of the former wooden quill.

Advantages claimed for this new design include: stiffer and more resistance to distortion; atmospheric conditions do not affect critical dimensions; swelling, splitting, and cracking of the quill are eliminated; better overall service; and less maintenance required.

In addition to supplying complete new spindles to replace the old wooden sleeve spindles, Saco-Lowell has



Spindle A (left) is a conventional McMullan spindle with wooden sleeve for paper tube. Spindle B (2nd from left) is the new all-steel McMullan spindle. Spindles C and D are conventional McMullan units which have been converted from a wood sleeve to a steel tube (Saco-Lowell).

facilities for replacing wood tops with all-steel tops on those spindles where the blade and whorl are in good condition.

New all-steel top spindles are interchangeable with wooden sleeve spindles of the same size.

Saco-Lowell Shops, 60 Batterymarch St., Boston, Mass.

For additional data, request item B-303, using business reply card on page 242.

Book on Woolen and Worsted Manufacturing

The latest British and Continental developments in woolen and worsted yarn manufacturing techniques are contained in a recently published

book entitled "Woolen and Worsted Yarn Manufacture," by J. W. Radcliffe (Emmott & Co., Ltd., 31 King St. West, Manchester 3, England). According to the author, much of the information on oiling and blending has not been published previously.

Union Special Announces New Machine for Seaming Knit Outerwear

A flat bed machine has been specially designed for operations on sweaters, heavy knit goods, and heavy outerwear.

Style 51300 P, which replaces Style 15800 D, produces the single needle, double locked stitch seam, Type 401-SSa-1. Trimming is done by a knife which automatically severs the fabric adjacent to the line of stitching, insuring a uniform width of seam on curves and straight sections. The minimum width of trimming, measured from the line of stitching to the trimmed edge, is one-eighth inch. Provision is made for rear disposal of trimmings from the trimming knife.

One of the features of the machine is that it is equipped with a wrench-adjusted differential feed mechanism which permits adjustment to the various types and weights of material to be seamed.

It is a high-throw machine, and, aside from the differential feed and trimming mechanism, it has an enclosed oiling system for looper drive eccentric and crank.

Union Special Machine Co., Chicago, Ill.

For additional data, request item B-107, using business reply card on page 242.

Aluminum Riser for Narrow Fabrics

A sturdy, aluminum riser for finishing narrow fabrics features high-speed, highly polished rollers, running on sealed noiseless bearings, eliminating all drag, according to the manufacturer.

Fast starting will not break frail tapes or ribbons, it is claimed. Quick or sudden stops will not tangle or break material because of backwind.

Free, controlled movement gives uniform and unbroken blocking. Rollers can be stopped at any speed by

Specifications

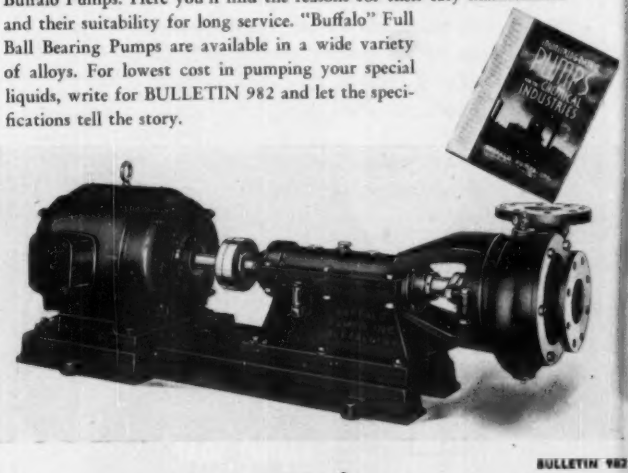
SPEAK LOUDER THAN ADJECTIVES

SPECIFICATIONS — BUFFALO FULL BEARING PUMPS

Casing: Solid shell volute type with removable suction side plate. Male and female fit insures perfect alignment of casing with supporting housing. Casing can be revolved before or after leaving the factory to give at least four different positions of openings. Unless otherwise requested, pumps are arranged with vertical up discharge. Can be furnished either rotation. **Wearing Rings:** Easily renewable wearing rings, protect casing from wear. **Impeller:** High efficiency enclosed type with liberal openings to pass abrasive solids. Enclosed impeller construction eliminates wear on the pump casing. Impeller mounted on shaft by feather key and lock nut and screw. Open impeller can be furnished where necessary, in which case wearing rings are omitted. **Bearing Housing:** Supporting head and bearing housing cast integral and bored at same operation insuring permanent alignment of all parts. Large oil capacity reservoir requires replenishing only at long intervals. (Su...

in "Buffalo" PUMPS FOR ALLOY CONSTRUCTION

A look at the specifications tells of the fine quality construction of Buffalo Pumps. Here you'll find the reasons for their easy maintenance and their suitability for long service. "Buffalo" Full Ball Bearing Pumps are available in a wide variety of alloys. For lowest cost in pumping your special liquids, write for BULLETIN 982 and let the specifications tell the story.



BULLETIN 982

"Buffalo" PUMPS

BUFFALO PUMPS INC.

175 MORTIMER ST. BUFFALO, N. Y.

Canada Pumps, Ltd., Kitchener, Ont.
Branch Offices in all Principal Cities

A BETTER CENTRIFUGAL PUMP FOR EVERY LIQUID

Whether for fashion or industry, your yarns or fabrics will win greater favor, give greater service . . . and cost you less when they're processed with Laurel soaps, oils, finishes. Scientifically developed, laboratory- and mill-tested, these quality Laurel wet processing agents are pure, uniform, dependable. Only top grade raw materials are used. Since 1909 important wet processors have found Laurel processing agents yield smoother, more efficient production, more salable finished products. Take advantage of Laurel's wet processing experience. Write or call the Laurel Technicians for recommendations.

Greater efficiency of LAUREL soaps, oils, finishes keeps your wet processing costs down—

Laurel Synthetic Detergents • Laurel Hydrosol • Laurel Wool Oils • Hydrocop • 3B Softener Laurel Rayon Oils Laurel Nynit C Laurel Hosiery Finishes • Laureltex Transfer Remover Laurel Knitting Machine Oil

textile soaps, oils, finishes

LAUREL SOAP MANUFACTURING CO., Inc.

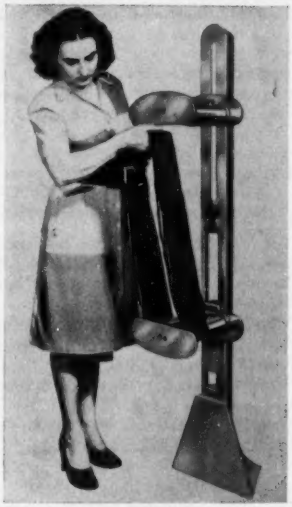
Wm. H. Bertolet's Sons

ESTABLISHED 1909

2603 E. TIOGA STREET
Philadelphia 34, Pa.

Warehouses:
Paterson, N. J.
Charlotte, N. C.
Chattanooga, Tenn.

NEW Equipment AND MATERIALS



Aluminum riser for narrow fabrics (Landis).

hand. Maintenance cost is said to be negligible. No lubrication is required.

Manufactured in two sizes, the Model 1-A riser is designed for 100 or 200-yard skeins of light ribbon or seam binding; Model 2-A is for heavier, bulkier skeins.

Floor space is conserved through the use of this equipment since the risers can be placed in line only 2½ feet apart.

A. B. Landis Sons, Inc., Chestnut Hill, Philadelphia 18, Pa.

For additional data, request item B-304, using business reply card on page 242.

Ager Features Tension Control

The recently developed Cook Tenison Controlled Ager permits the use of any number of rolls and keeps the cloth under the desired tension.

Ager can be supplied with driven rolls at top or bottom as specified. Rolls are divided into several groups with a motor driving each group.

Cook-P&N Machine Co., Inc., 365 Dorchester Ave., Boston 27, Mass.

For additional data, request item B-109, using business reply card on page 242.

NEW Equipment AND MATERIALS

Flexible Coupling Has Unusual Design Features

Designed for use with motor-driven equipment which requires the use of electric motors with ratings up to ½ hp at 1750 rpm, a new series of flexible couplings reduces operating noise, absorbs torsional shaft vibration, and accommodates shaft misalignments of as much as 2 degrees angular and 1/32" parallel, according to the manufacturer. Hubs are stamped from steel stock. Neoprene is permanently bonded between two flanged hubs to produce a one-piece design which is easy to handle. New method of shaft attachment is said to eliminate need for keyways, pins, and set screws.

Lord Manufacturing Co., Erie, Pa. (B-201).

Angle Sight Feed Valves for Oiling Systems

A recently developed line of angle sight feed valves for pressure or gravity oiling systems is reported to permit manufacturers to construct their own lubrication systems. Valves have extremely free-flow characteristics, it is stated, and allow the flow of oil to be visually checked and closely regulated. They can be used singly (Style SFG) or gang mounted (Style SFM). Large orifices and low pressure drop facilitate dependable operation, the manufacturer states.

Oil-Rite Corporation, 3466 South 13th St., Milwaukee 15, Wis. (B-202).

Heavy Materials Sprayed Evenly; No Spurting

An air-operated, high volume material handling pump, designated the Graco Mogul-Type Powerflo Pump, is equipped with a device which, the manufacturer claims, positively prevents spurting. Unit operates on original 400-lb and 100-lb drums or bucket type containers, eliminating time-consuming transfer of rust and corrosion preventives, calking compounds, adhesives, undercoaters, etc.

Suitable for spray gun, pole gun, or extrusion gun application. Operates on broad air pressure range—20 to 175 psi.

Gray Company, Inc., Industrial Div., Graco Square, Minneapolis 13, Minn. (B-203).

AMONG THE MEN

IN THE MILLS . . .

America's LEADING Textile Journal

Textile Industries leads in reader preference of mill executives, as was shown in the most recent impartial survey, throughout the most dominant section of the industry. Ranked first with a total greater than the next two publications combined.

Textile Industries leads all other textile publications in total mill circulation in the United States.

Textile Industries leads all national textile publications in percentage of mill circulation. 86% of T. I.'s total paid is among production, management and operating men actually in the mills.

TEXTILE INDUSTRIES

806 Peachtree St., N. E., Atlanta 3, Ga.

NEW Equipment AND MATERIALS

Chemical Formulary

The new Volume IX of *The Chemical Formulary* is a collection of new up-to-date formulas compiled by the country's leading industrial and research chemists in each field of industry, according to the publisher, Chemical Publishing Co., Inc., 26 Court St., Brooklyn 2, N. Y. Information of interest to all important industries is contained in this book. (599 pages—$7.00).

Remote Control Dictation System Now Available

Handling of business correspondence can be greatly improved through the use of a recently developed system of "remote control" dictation, according to the equipment manufacturer. The TeleVoice System, as it is called, consists of from one to twenty modified telephones directly connected to a central recording instrument located near the secretary. The instrument records the dictation received on plastic discs. Transcription of dictated matter is accomplished with standard secretarial unit. Stations can be located any distance from recorder.

Thomas A. Edison, Inc., West Orange, N. J. (B-204).

Chrome Plating Unit for Plant Use

The normal life of most cutting tools and wear parts can be increased three to ten times by a new and economical, industrial hard chrome plating process embodied in the Model A-20 "Chromaster" unit and "Chromasol," according to a recent announcement. Development provides complete facilities for hard chrome plating metal surfaces up to 10 square inches at the recommended current density of 2 amps. per sq. in. Unit is compact and completely portable. Average time required to hard chrome cutting tools and the like—1½ minutes. Friction is said to be reduced 12 to 20% where chrome plated parts are employed. No plating experience required.

Ward Leonard Electric Co., Industrial Chrome Division, Mount Vernon, N. Y. (B-205).

Universal Joint Features Low Friction

Available in single or double joint form, 1¼" O.D. or larger, solid or bored hubs, round, keyed or splined shafts, a new "Lo Friction" series of universal joints has been developed primarily for industrial applications where the joint friction heat or kinetic energy must be dissipated rapidly. Of unique design is the friction block of the joint. By reducing bearing surfaces and providing for adequate and constant lubrication through the use of a patented oiler, this universal has been made possible.

The Curtis Universal Joint Co., Inc., Springfield, Mass. (B-206).

British Manufacturers Listed in Directory

The 23rd edition of the "F. B. I. Register of British Manufacturers" (1950/51) was recently published for the Federation of British Industries by Kelly's Directories Limited and Iliffe and Sons Limited, Dorset House, Stamford Street, London, S.E.1, England. Size 9½" x 7½".

YOUR BEST SOUTHERN SOURCE FOR SPINNING BOLSTERS AND TEXTILE REPAIR PARTS FOR CARDING AND SPINNING.

E. E. SMITH & SON

QUALITY TEXTILE MACHINE PARTS

GASTONIA, NORTH CAROLINA

NEW Equipment AND MATERIALS

852 pages. Bound full cloth.

The directory provides, according to the publishers, a cross-section of the most important producers of British goods in a wide range of industry.

Multi-Purpose Grease

An oxidation inhibited multi-purpose grease, designated "Cosmolube," is reported to meet all the grease needs in the average industrial plant. An outstanding feature claimed for the product is its resistance to high heat, cold, or wet conditions. Grease is of smooth texture; clings well to all metal surfaces; long lasting; simplifies lubrication; reduces errors of misapplication; and saves time and space. Available in No. 1 and 2 consistencies.

E. F. Houghton & Co., 303 W. Lehigh Ave., Philadelphia 33, Pa. (B-207).

Metal Preservative

"Saf-pHilm Rust Preventive" is a new dark-colored, solvent type, organic metal preservative, especially developed for the protection of highly finished surfaces, parts, and equipment prior to storage or shipment. It is fast drying, forming a colored, yet transparent, film within 15 minutes. Film can be removed with kerosene or other solvent; resists acids and alkalies; also abrasion resistant. Easy to apply.

Swan-Finch Oil Corp., R. C. A. Building West, New York 20, N. Y. (B-208).

Pipe Line Scraper Strainer

Inside the cylindrical screen of a strainer now on the market is a motor-driven scraper blade which rotates like a worm gear. This rotor blade hugs the inside of the screen and scrapes off the dirt or other solid material as soon as it is trapped. Advantages cited include: eliminates shutdowns and the labor consuming job of removing and cleaning dirty strainer screens; eliminates the hazard of foreign particles being forced through a dirty screen; permits the use of closer mesh screen; removes solids or scums, without interruption of flow, from any fluid such as river water, wax, brine, etc.

Sarco Company, Inc., Empire State Building, New York 1, N. Y. (B-209).

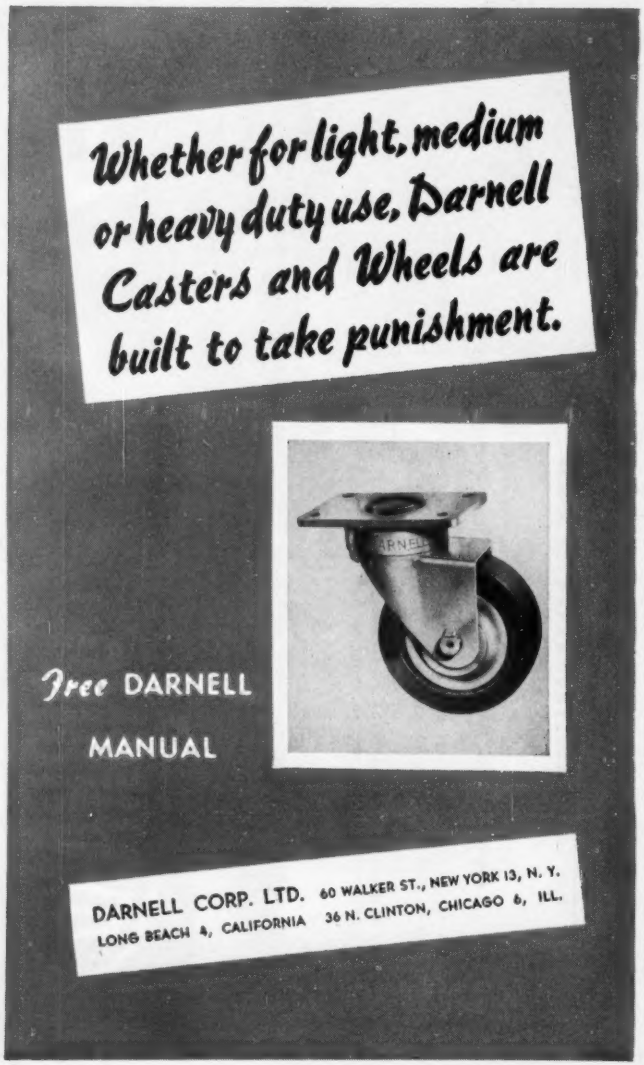
WHY
UNBRAKO
Knurled Socket Head Cap Screw
Flat Head Socket Cap Screw
Knurled Point Socket Set Screw
Knurled Socket Head Shoulder Screw
Fully-Formed Pressure Plug
Precision-Ground Dowel Pin
We can deliver...
A continuing, long-range program of plant modernization and improvement is one of the ways we keep our capacity equal to the increasing demand for UNBRAKO Socket Screw Products.
It takes skilled people, working with top-flight equipment in spacious, well-planned buildings to give you all the UNBRAKOs you want, when you want them.
After all, capacity at SPS simply means: "We can Deliver..."
Write for your UNBRAKO Catalog.
-SPS STANDARD PRESSED STEEL CO.
JENKINTOWN 34, PENNSYLVANIA

NEW Equipment AND MATERIALS

Large Capacity, Gravity Feed Oiler

Now available with 10 oz., 1 pint, 1 quart, and 2½-quart capacity Pyrex glass or Lucite plastic reservoirs is a new line of gravity feed oilers with lock ring or ratchet feed adjustment. These oilers are designed to feed any predetermined number of drops per minute and are especially recommended for applications on large stationary bearings, conveyor drive chains, etc., wherever a large quantity of oil is required or when it is desirable to extend reservoir filling time to the maximum. Has standard threads for mounting directly on top of bearing or part to be lubricated. Also available with lock-nut on sight fitting for tightening to mounting bracket and with a compression fitting for connection to copper or Neoprene tubing.

Trico Fuse Mfg. Co., 2948 No. 5th St., Milwaukee 12, Wis. (B-212).


Whether for light, medium or heavy duty use, Darnell Casters and Wheels are built to take punishment.
Free DARNELL MANUAL
DARNELL CORP. LTD. LONG BEACH 4, CALIFORNIA
60 WALKER ST., NEW YORK 13, N. Y.
36 N. CLINTON, CHICAGO 6, ILL.

150-lb Dry Chemical Extinguisher on Wheels

For combatting flammable liquid and electrical fires in industrial plants, a new portable dry chemical fire extinguisher with 150-lb powder capacity has been developed. Mounted on two wheels and properly balanced to permit one man mobility. Fifty-foot hose fitted with discharge nozzle with stirrup-type control lever. Lever has three positions: "Off," "Fan," and "Straight" for control of the powder stream. Materials used in construction of extinguisher are corrosion resistant. Dry chemical mixture is formulated to prevent moisture absorption, according to the manufacturer.

Walter Kidde & Co., Inc., Belleville, N. J. (B-213).

Synchronous Motion Picture Camera for Process Study

New Model IV 35-mm synchronous motion picture cameras are used in parallel wired gangs of two or more cameras for synchronous data recording. Events taking place simultaneously at separated locations may be photographed while maintaining shutter accuracy of one millisecond among all cameras in a gang. May be used for single frame or continuous exposures. Suitable for process control analysis and wide-base stereographic photography. Special features include: incandescent and argon coding and timing marker lamps, change gears for speeds of 5, 10, and 20; or 4, 8, 16, and 32 frames per second; a thermostatically controlled film chamber heater.

Flight Research Engineering Corp., P. O. Box 1-F, Richmond 1, Va. (B-214).

Books of Interest to Research Personnel

The second, enlarged edition of *Organic Reagents for Organic Analysis*, by the Hopkins and Williams laboratory staff, has been published by the Chemical Publishing Co., 26 Court St., Brooklyn 2, N. Y. ($5.00). It is said that about 100 pages on important new developments in organic analysis and organic reagents have been added to the first edition of the book.

The technique of modern microscopy, including ultraviolet micro-

NEW Equipment AND MATERIALS

scopy and the use of the electron microscope, is covered in another new book, *Practical Microscopy*, by L. C. Marton and B. K. Johnson. It is also available from Chemical Publishing Co. ($2.50).

"Plug-In" Humidity Control

For the automatic control of electrically powered humidifiers and dehumidifiers a new "plug-in" type humidity controller is being marketed. Only three steps are necessary to install the device: (1) Plug the humidifier or dehumidifier into the control; (2) Plug the control into a wall outlet; (3) Set the dial at the percentage or relative humidity desired. Units are then ready for fully automatic operation. Continuous load of 1700 watts can be accommodated.

Abbeon Supply Co., 58-10 41st Drive, Woodside, N. Y. (B-210).

Portable Steam-Jet Unit for Use Where Steam is Available

A steam-jet cleaning unit, known as the "Speedyjet," is a portable unit without built-in boiler designed for use where high pressure steam source is available. Includes high pressure detergent tank; also 25 feet of high pressure steam hose for connection to steam source and 25 feet each of steam and detergent hose from the tank to the lance.

Livingstone Engineering Co., 100 Grove St., Worcester 5, Mass. (B-211).

High-Speed Synchronous Generators Announced

Built in four basic designs, a new line of "Tri-Clad" high speed synchronous generators have ratings from 1.875 to 50 kva. Designated as Types ATI, ASI, and ATB, the generators have frequency ratings of 60 to 400 cycles. Three standard types of 60 cycle units are offered, providing a range of characteristics for several different categories of voltage regulation and motor starting requirements. Variations of basic machines are available.

General Electric Co., Small and Medium Motor Divisions, Schenectady 5, N. Y. (B-215).

- Eliminate replacement cost
- Entirely new construction
- Indestructible
- Greater Flow—for better dyeing
- Minimum Resistance—Open flow to package
- Interchangeable for all sizes of dye tubes

Developed by the Manufacturers of Stienen-Obermaier Equipment.

STIENEN Lead with the LEADER OBERMAIER

Pat. Pend.

Standard Fabricators
INCORPORATED
355 Walton Avenue • New York 51, N. Y.

Underwear Industry Completing Plans for Quick Mobilization

Lessons of the last war have been applied in a preparedness program that U. S. underwear manufacturers have been working on for the past year and a half and which they are now completing.

"We believe we're ready," said Roy A. Cheney, president of The Underwear Institute. "Last time we produced 720 million military undergarments, and we think we're prepared to top that record this time if called on to do so."

The industry, through its association and in co-operation with the government, is developing a voluntary program that will enable it to meet quickly any demands which a new emergency, whether large or small, would create.

The program was initiated with individual plant production surveys. These surveys were made to reveal (for confidential and coded correlation) the capacities, actual and potential, of the individual underwear mills in the industry. The total, of course, gives the overall picture of the entire industry's ability to produce—in speed as well as in quantity.

All operational phases, including plant personnel, were considered in these surveys which covered plants comprising about 80 per cent of the underwear production capacity of the country. It is now known what each plant can produce, in what period of time and how much.

One immediate benefit already gained, Mr. Cheney asserted, is that based on present known military requirements, it is apparent that a shortage in heavyweight service underwear could occur and to avert this possibility the industry's special committee on specifications has already prepared new alternative specifications to submit to the Office of The Quartermaster General.

The Institute also set up a committee to appraise the total findings and make recommendations for general, as well as individual, production improvements.

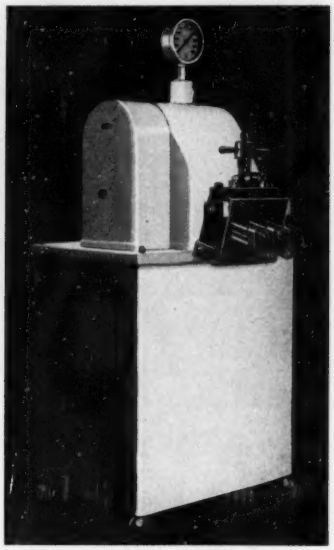
Another phase of the mobilization program is the continuing study of materials, chemicals, and other necessary supplies for the production of underwear.

An inventory of equipment was also taken in the surveys. This information on the number and types of machines and spare parts in the mills can be put to use in many ways.

In the event that enemy action destroyed a mill, for example, or even a segment of the industry, salvaged machines could be shipped to another place to fit into the production scheme. As revealed by the survey, machine surpluses could be transferred to other plants to fill their immediate needs in time of emergency.

Training programs, too, have been set up within the industry embracing all phases of operations on the different types of underwear for the various branches of the

LOGEMAN TEXTILE HOMOGENIZER



ENGINEERED AND DESIGNED SPECIFICALLY FOR
TEXTILE SIZING

•

HOMOGENIZED SIZE EFFICIENCY AT A NEW LOW PRICE

•

This new 1950 Logeman Textile Size Homogenizer is designed exclusively for textile manufacturers, to meet every specific requirement necessary in the preparation of superior warp size mixes.

•

Investigate this Logeman Textile Homogenizer now and let us prove to you its value and efficiency.

Write for complete details and prices

Southern Distributor
SOUTHERN SIZING COMPANY
ATLANTA 1, GEORGIA

ADVANTAGES OF THE LOGEMAN TEXTILE HOMOGENIZER

- PRODUCES UNIFORM SIZING AND CONTROLS SIZE VISCOSITY.
- REDUCES SHEDDING AND INCREASES WEAVING EFFICIENCIES.
- ELIMINATES SIZE COOKING AND REDUCES STEAM COSTS.
- SAVES TIME AND CUTS OPERATING COSTS.
- HEAVY DUTY—RUGGED DESIGN—SIMPLE ASSEMBLY WITH FEWER PARTS—CAPABLE OF CONTINUOUS HIGH PRESSURE OPERATION.
- PRESSURE HEAD CAN BE DISASSEMBLED FOR CLEANING AND REASSEMBLED IN 10 MINUTES.
- COMPACT DESIGN — LESS FLOOR SPACE REQUIRED THAN WITH OTHER HOMOGENIZERS.

C. W. LOGEMAN CO. 633 BERGEN STREET, BROOKLYN 17, N. Y.

service. These are made available to any mills doing government work, as needed. As new developments occur to affect existing training programs, changes are made to bring them up to date.

Charted results of the mobilization program have been microfilmed, and films have been shipped for safe-keeping to areas that would be reasonably safe from possible atomic attack.

Starch Handling at Pineville

(*Continued from page* 181)

held for another 1½ hours and then dropped to 190 F, where it is held until the size is transferred to the storage kettle. While this cam is controlling the time and temperature of cooking, the temperatures are recorded on a recording instrument. The controlling cams and all recording instruments are mounted in a control panel in the size room.

Kettles and Tanks. The two cooking kettles and the storage tank are also manufactured by firms accustomed to making food handling equipment. They are jacketed on the outside with carbon steel, lined with stainless steel, and insulated with rock wool. The tanks were manufactured by Metal Glass Products Co.

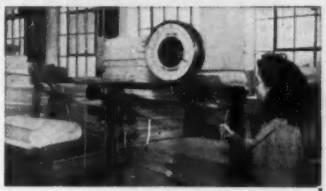
Two pumps are used, one to transfer size from the cooking kettles to the storage tank and one to circulate size from the storage tank to the slashers. These pumps are food pumps manufactured by Waukesha Sanitary Pump Co.

Results. The system as a whole handles starch, water, cooking time and cooking and storage temperatures automatically. V. R. Revels, superintendent of the Pineville plant, says the equipment is doing an excellent job and is paying off well on the investment.

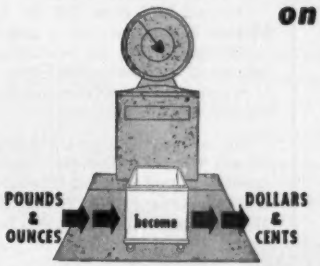
PRINTWEIGH STOPS ERRORS

For closer cost control in your textile plant—Toledo Printweigh Scales provide printed weight records . . . assure you that the accurate indication of the Toledo dial will reach your accounting records without chance of human error. Prints big, clear figures . . . on thick tickets . . . on large or small sheets . . . on strips . . . with extra copies. Saves time, stops losses for receiving, production, shipping, stock rooms, and many other textile weighing operations.

PRINTED WEIGHTS


YARDAGE SCALES

MATERIAL becomes MONEY on your SCALES!



Errors made at the scale stay wrong forever. There is no chance to recheck; either the material has been shipped or has lost its identity in the general stock. You've got to be *right*—weigh it right—Toledo Printweigh means *accurate* weights *accurately* recorded! Send for bulletin 2021 on modern weight control. Toledo Scale Company, Toledo 1, Ohio.

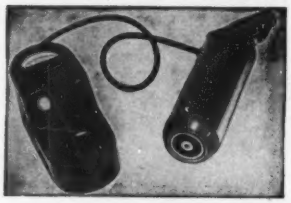
Guard Costs with **TOLEDO** *All the Way*

for

TESTING MOISTURE CONTENT

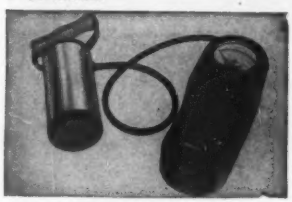
2 Great Models

in
- Wool
- Cotton
- Rayon and
- Nylon



MODEL PD-1

for textiles in loose or compressible forms—3" penetration.



MODEL K-2

for textiles in cones, rolls, beams and similar forms.

10-DAY FREE TRIAL!

Try one of these moisture testing instruments for 10 days—use it, test it and prove its superiority. Send samples, moisture range and Purchase Order to cover trial period. No obligation!

Quick, Accurate Readings

In less than 3 seconds you can test moisture content of practically all types of textile materials, including cotton, wool, rayon and nylon in fabrics, packages and loose forms.

This portable instrument is designed for "on the spot" checks in your plant. Moisture Register is easy to operate—requires no technical knowledge or complicated figuring. Cost is negligible in comparison to advantages. Write today for complete details. Specify type of material to be tested.

MOISTURE REGISTER CO.

Dept. H

1510 W. CHESTNUT ST., ALHAMBRA, CAL.

ELECTRONIC MOISTURE REGISTER

Mfd. by Moisture Register Co. 1510 West Chestnut Street Alhambra, California

What the TEXTILE MILLS are doing

West Point (Ga.) Manufacturing Co. is planning an addition to its branch mill at Fairfax, Ala., along with alterations and improvements to the present building.

The mill and business of Georgia Rug Mill, Inc., Summerville, Ga., has been acquired by **Bigelow-Sanford Carpet Co., Inc.** Operations are expected to continue as before.

Norman Butler is president and treasurer of the recently chartered **Norbut Manufacturing Co., Inc.,** Fall River, Mass.

Strutwear, Inc., Minneapolis, Minn., will operate a branch mill at Clarksdale, Miss., in a newly constructed building to be occupied under long term lease.

Bear Brand Hosiery Co., Chicago, Ill., has plans under way for construction of a branch mill at Kearney, Neb., for production of full-fashioned hosiery.

A one-story addition to the mill, for warehouse service, is being constructed by **Foster Yarn, Inc.,** Trenton, N. J.

Rocky Mount (N. C.) Rayon Mills, Inc., have under construction a one-story addition which is expected to double the size of the present plant.

A one-story addition to the mill will be constructed by **Schneider Silk Co.,** Taylorsville, N. C.

Contract has been let by **J. P. Stevens & Co., Inc.,** for a new mill at Wallace, N. C., for production of fabrics of synthetic yarn. The cost is reported to be approximately $3,500,000, with machinery.

The recently chartered **Wilmington (N. C.) Warp Knitting Co., Inc.,** will operate a mill for manufacture of tricot and other fabrics. Herbert Falk, Joseph Carruthers, Jr., and Charles Roth, all of Greensboro, N. C., are the incorporators.

The plant and business of Tekno Prints, Inc., Passaic, N. J., have been acquired by **Western Products, Inc.,** Newark, Ohio. Operations are expected to continue without change.

Space has been leased at 4080 Frankford Ave., Philadelphia, Pa., by the recently organized **Samson Worsted Mills, Inc.,** to be occupied for a new worsted weaving mill.

An expansion and modernization program, to cost about $100,000, is being carried out by **Linda Cotton Mills, Inc.,** Cowpens, S. C.

Contract has been let by **Firestone Textiles, Inc.,** for construction of a one-story addition to its plant at Bennettsville, S. C.

Woodside Mills, Greenville, S. C., have let contract for a one-story addition to the weave room in Plant No. 1 at Liberty, S. C.

International Harvester Co., Fiber Twine Division, has plans under way for a twine and cordage mill at New Orleans, La., reported to cost approximately $2,000,000.

Park & Barstow, Inc., Dexter, Me., has acquired the local plant of Dumbarton Woolen Mills, Inc., to be operated as a branch mill.

The recently chartered **American Textile Associates, Inc.,** Hudson, Mass., will manufacture textile products of various kinds. John D. Hogan, Jr., is president and treasurer.

Lawrence (Mass.) Woolen Co. was recently acquired by F. V. Hanson, formerly secretary of the company. It is reported that operations will be discontinued and the property placed on the market.

Hoosac Mills Corp., New Bedford, Mass., has plans under way for alterations and improvements in the mill, reported to cost about $25,000.

Woodrow Denico, former boss carder at Cheshire Mills, Harrisville, N. H., is president of the recently incorporated **Denico Yarn Co., Inc.,** North Oxford, Mass., which will operate a mill for manufacture of cotton yarns.

Cotton braids and kindred products will be manufactured by the recently chartered **Commercial Braid Corp.,** Wakefield, Mass.

Vassar Co., Chicago, Ill., is being merged with **Munsingwear, Inc.,** Minneapolis, Minn., and will be operated as a division of Munsingwear under the latter's name.

What the TEXTILE MILLS are doing

The recently chartered **Blaine Hosiery Mills, Inc.**, Concord, N. C. will operate a knitting mill for manufacture of hosiery. Douglas Dameron and Stokes White are principal incorporators.

Western Electric Co. has purchased the former mill of **Pomona Cotton Mills**, Greensboro, N. C., for a reported sum of $315,000. The mill will be used for a new line.

Pioneer Hosiery Mills, Inc., Hickory, N. C., recently incorporated, will operate a knitting mill for manufacture of hosiery. P. G. and D. S. Menzies head the new company.

A one-story building, to be equipped as a textile laboratory, is under construction at **North Carolina State College of Agriculture and Engineering.**

A. F. Garrou & Sons, Inc., Valdese, N. C., are planning to convert their mill from production of men's seamless half-hose to women's 66-gauge full-fashioned hosiery.

Marion (N. C.) Manufacturing Co. has announced plans for an expansion and modernization program at its mill.

The Mount Joy, Pa., mill of **George Brown's Sons, Inc.**, has been closed and production is being concentrated at the firm's plant in Lenni Mills, Pa. It is reported that the machinery and equipment at Mount Joy will be sold.

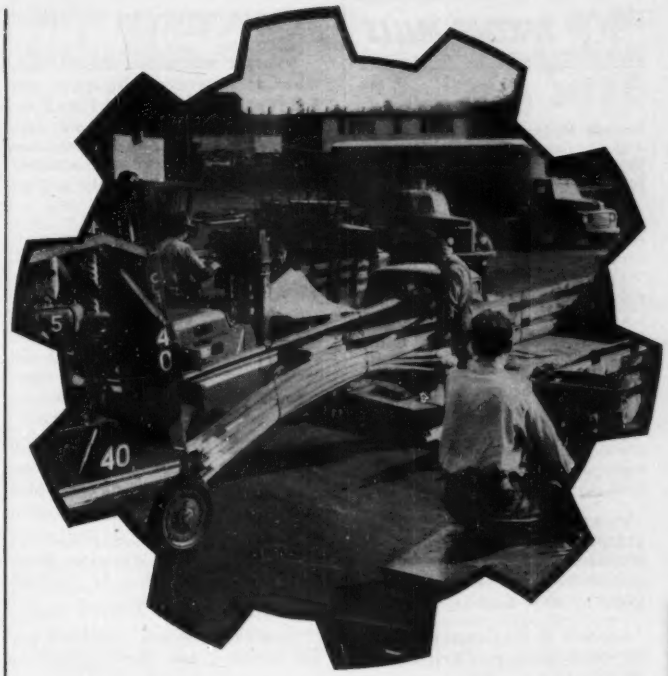
The mills and business of **Appleton Co.**, Anderson, S. C., sheetings and flannels, have been acquired by **J. P. Stevens & Co., Inc.**, with operations to continue as before.

A one-story addition to their plant, to be equipped for increased production, is planned by **Airmaid Hosiery Mills**, New Braunfels, Tex.

Land has been purchased in Charleston County, S. C., by **United Piece Dye Works**, for construction of a plant to cost approximately $1,000,000.

Construction of a 90,000 sq ft weaving plant near Honea Path, S. C., is under way by **Westover Mills, Inc.** The structure will house between four and five hundred looms for weaving of synthetic fabrics.

Willys of Hollywood, Hollywood, Calif., recently acquired by **Sanson**



Geared to Today's Task of Supplying Warehouse Steel

Our biggest problem—like yours—is getting enough steel. And we—like you—are having a rough time. But we are doing all we can to get our fair share.

Our next job is seeing that you get your fair share. Distributing our products on an equitable basis presents no problem—simply a lot of work, which we are glad to do.

Suggesting suitable substitute steels, advising folks on availabilities, keeping up with latest government regulations—all are a part of the task we are geared to meet. Call us if we can help you.

Our Warehouse Division is guided by the same sound business principles which have carried the Atlantic Steel Company through fifty years of steady growth and progress.

WAREHOUSE DIVISION
Atlantic Steel Company
ATLANTA, GEORGIA • EMERSON 3451

What the TEXTILE MILLS are doing

Hosiery Mills, Inc., Philadelphia, Pa., will be operated as a branch mill. Women's full-fashioned hosiery will be manufactured.

Liberty Mutual Insurance Co. recently presented a second safety award to the employees of Piedmont Weaving Plant, **Burlington Mills Corp.**, for completing two million man hours without a lost-time accident. The first award was made in October, 1948.

Belding Corticelli honored the thirty-two members of its 25-year club, New York area chapter, with a dinner on December 20. Three additional chapters of the club bring the total membership to 141.

Construction is under way on a $1,000,000 addition to the plant of **Williamston (S. C.) Cloth Mills.** Expansion will increase the number of looms by more than 54%.

Laurens (S. C.) Cotton Mill has under construction a 17,000 sq ft two-story warehouse, to cost in excess of $50,000.

National Automotive Fibers, Inc., have announced an expansion and improvement program at their California Cotton Mills Division plant at Salem, Oregon. It is reported that the program will cost approximately $300,000 and will double the amount of floor space available.

A new woolen and worsted commission weaving and finishing mill, to be located in the former property of **H. H. Wood Hosiery Mill**, Lakeport, N. H., is being started by Raymond T. Preuss, formerly overseer of weaving of A. D. Ellis Co., and Garfield J. Pelkie, who was overseer of finishing at Wilson Woolen Co.

The former Belleville Woolen Mill, Allenton, R. I., has been purchased by **Ace Woolen Mills**, Bridgeton, Me., to be operated under the same name.

Ninety new wide looms were recently installed at **Wamsutta Mills**, New Bedford, Mass., to increase their sheeting capacity.

Additional 168-inch high-speed tricot machines have been installed at **Natona Mills, Inc.**, Dallas, Pa., for increased productive capacity.

Nylon and cashmere blends will be the specialty of the newly organized **Pachaug Mills, Inc.**, 2 South Golden St., Norwich, Conn. Three sets of cards and 1248 woolen spendles have been installed. W. B. Dunn, president, W. S. Hill, former head of Hill Woolen Mills, vice-president and general manager, and H. Dunn, treasurer, are the officers of the new organization.

260 acres at Lakeview, N. C., have been purchased by **Wyandotte Worsted Co.**, Waterville, Me., for erection of a plant which, it is reported, will be operated as a woolen mill.

A proposed addition to the plant of **Dwight Manufacturing Co.**, Alabama City, Ala., is expected to add 46,000 sq ft to the present floor space.

Amoskeag Industries, Inc., has sold the No. 3 mill in its central division to **Verney Corp.** to be used for warehouse purposes. The mill has six stories and contains approximately 220,000 sq ft of space.

An expansion program totaling over a million dollars is under way at the Dover group of mills. Included in the program is a new weave room and installation of 400 looms, at **Dover Mill**, Shelby, N. C., and modernization of the entire plant. This mill is also inaugurating production of tricot cloth, nine tricot knitting machines having been installed. The **Dover Yarn Mill** plant at Buffalo, N. C., will be doubled in size, including the addition of a two-story air-conditioned building at the south end of the present structure.

Plant expansions and heightened sales promotion are part of the new program planned by **William Carter Co.** The firm's plant at Forsyth, Ga., will be expanded to more than double its present size, and it is also expected that the San Francisco office will be enlarged.

Lancaster Looms have sold their cotton mill at Boiling Springs, N. C., to J. Frank Love and associates, of Shelby, N. C. The mill will henceforth be known as the **Marion Yarn Mills.**

Monarch Knitting Co. Ltd., which has yarn, hosiery, and underwear plants in Toronto, Dunnville, and St. Catherines, Ont., is planning a new yarn mill in the Sarnia, Ont., area. With the new mill in production, the firm will have all the cotton and woolen yarn it needs, without resorting to outside sources.

OVER 90 NEW

"H-W" CONDITIONER

installations in HOSIERY MILLS during the past 18 months

Scores of new "H-W" CONDITIONERS for Nylon Hosiery Applications have been purchased by mills everywhere. Enthusiastic testimonials from users attest to the money-saving and operating advantages of this outstanding machine. Following are typical reports from only several users:

- "The new 'H-W' CONDITIONER conditions and dries the stockings automatically in one operation. Effects large increase in perfects . . . also increased production of seamers and loopers. BIJOU HOSIERY MILLS, INC.
- "The 'H-W' CONDITIONER has paid for itself after only several months' operation." NORTHMONT HOSIERY CORP.
- "The 'H-W' CONDITIONER in our mill is proving very successful . . . perfects greatly increased . . . many other advantages . . . very economical to operate." SIGNATURE HOSIERY COMPANY.
- "Any hosiery mill producing monofil nylon must have your equipment to manufacture such stockings satisfactorily." APEX HOSIERY CO.
- "The 'H-W' CONDITIONER assures improved conditioning, increases yield of perfects, speeds up seaming and looping; reduces snagging and mending to a minimum." BERKSHIRE KNITTING MILLS.

Other testimonials from satisfied users furnished upon request. Write for Bulletin UC-3.

*Trade-Mark Reg.

The Industrial Dryer Corporation

STAMFORD, CONN.

The adjustable handle makes it possible to scrub and wax polish in congested places where hand cleaning had been necessary before — around and under machines, counters, desks, lockers, etc.

Operator can raise or lower handle to any angle within an 80 degree arc and shove the Lawlor under any equipment where there is at least a 9½ inch opening and as far back as 4½ feet.

Three Models—a size to suit every need

ANOTHER POPULAR LAWLOR

The Model 20-D is designed for large areas. It does everything in one operation: deposits clean water over the soaped floor, a 19" revolving brush scrubs it thoroughly; then a rubber squeegee mops up the dirty water, which is vacuum pumped into a second tank. The Model 20-D is only 22" wide and can be used around machines and equipment. The nice thing is that one person can easily operate it.

MOP WRINGERS

Quality built of all steel with perforated rolls. Foot lever operation. Made for one or two pails.

MOPPING TANKS

Made of heavy galvanized steel with welded seams. Two compartments, each with shut-off. Foot-pressure wringers. 30 or 60-gallon capacity.

All Lawlor Equipment is sold and serviced by local Janitor Supply Houses

Write for Catalog of complete line

S. C. LAWLOR CO.

Quality Floor Equipment for 50 Years

121 N. Aberdeen St., Chicago 7, Ill.

What the TEXTILE MILLS are doing

Knit Products Corp., Belmont, N. C., is reported to be planning operation of a new mill at Charlotte, N. C., for manufacture of hosiery.

The mill of Double Shoals Mill Co., Shelby, N. C., has been purchased by **Slater Bros., Inc.**, 460 Totowa Ave., Paterson, N. J., to be used as a branch.

An addition to its tarpaulin manufacturing plant is under construction by **H. Wenzel Tent & Duck Co.**, St. Louis, Mo. The new space will provide facilities for water-proofing, flameproofing, and mildewproofing canvas for tents and tarpaulins.

Jackson Hosiery Mills, Inc., High Point, N. C., has been converted to a finishing mill, to specialize in the handling of hosiery.

Edward Speir, Charlotte, N. C., is president of the recently chartered **Speir Textiles, Inc.**, Morganton, N. C. A one-story building has been leased for manufacture of knit tricot fabrics from synthetic yarns.

Springs Cotton Mills, Lancaster, S. C., have anncunced contracts made with Whitin Machine Works and H. & B American Machine Co. to change 315,000 cotton spinning spindles to the new superdraft Casablanca which was developed in the research department of the mills in conjunction with these two firms. It is expected that more than a year will be required to complete the order. Plans are under way also to build an addition to the Fort Mill, S. C., plant to house 400 looms.

A one-story addition to the plant is under construction by **Massapoag Mills Corp.**, Lincolnton, N. C., and additional looms will be installed.

Plans have been announced for expanding-spinning and weaving facilities at the Trion, Ga., plant of **Riegel Textile Corp.** To accomplish this, it will be necessary to move the present glove factory to Greenville, Ala., the manufacturing building of the Merrimac Hat Corp. having been purchased for this purpose.

A 400-acre site at Hanahan, S. C., has been acquired by **United Piece Dye Works, Inc.**, Lodi, N. J., for a plant to dye, finish, and print textiles. The first unit is expected to involve an expenditure of more than a million dollars.

Save "Man Hours"

Every time you use Selig's

FLOR-O-SEAL FLOR-TONE

Dry Maintenance Method

Man-hours mean more today than ever before. Penetrating FLOROSEAL keeps moisture, oil and grease from damaging floors while FLORTONE prevents dirt and grit from being ground into the floor surface. This sealer-maintenance method makes every man-hour count for cleaner, safer, brighter and longer-wearing floors at lower cost.

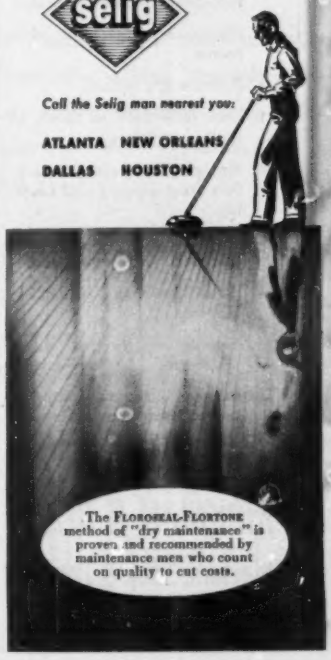
The Selig Company

Manufacturing Chemists
Since 1896

selig

Call the Selig man nearest you:

ATLANTA NEW ORLEANS
DALLAS HOUSTON

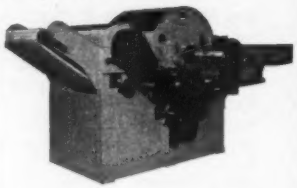


The FLOROSEAL-FLORTONE method of "dry maintenance" is proven and recommended by maintenance men who count on quality to cut costs.

Don't Use Two When 1 Will Do

K & D Single Cylinder

Waste Machine Will Do the Same or Better Job on Just One Cylinder as Similar Machines Using Two Cylinders



NOTE ADVANTAGES:

1. Provides double action with better results on a single cylinder.
2. Made with 60% fewer gears, sprockets, chains, etc., with tremendous savings in parts replacement and maintenance.
3. Eliminates fans and dust rooms.
4. Reduces fire hazard.
5. Uses only half as much of mill's floor space.
6. Reduces damage to waste fibers from nipping and chewing.
7. Provides safety guards for sprockets, gears, and chains.
8. Saves power by using 7½ HP motor.
9. Simpler construction assures fewer stops, less down time.
10. Renders larger percentage usable fiber from mill waste.

Write for NEW Catalog

KIRKMAN & DIXON

Machine Shop & Foundry

Greenwood, S. Carolina

Personal NOTES ABOUT MEN YOU KNOW

Fulton Bag and Cotton Mills, Atlanta, Ga., have announced the election of **Clarence E. Elsas** to succeed the late W. R. Elsas as president of that firm. Mr. Elsas was a vice-president, having joined the firm in 1926.

David J. Crowell has been made superintendent at Wennonah Mills, Lexington, N. C., replacing **Earle E. Riddle**, who is now general manager. **Earl L. Stewart**, formerly with the Republic Cotton Mills, is now head of the new cost and standards department of the plant.

Burlington Mills Corp. has announced the appointment of **Smith Crow, Jr.**, formerly of Steele Spun Weaving plant, as assistant superintendent of Flint Plant No. 2. Mr. Crow replaces **J. R. Timmerman**, now superintendent of the Modena plant.

Samuel F. Rubin of Gotham Hosiery Co. was recently re-elected president of the Full-Fashioned Hosiery Manufacturers of America, Inc. Other officers re-elected were: **Clarence Williams**, Federal Knitting Co., treasurer; **F. Elwood Struve**, Apex Hosiery Co., and **Thomas Robson**, Fort Wayne Knitting Mills, vice-presidents, and **Eugene Springer**, executive vice-president.

Wyllys H. Taylor, who was formerly president of Newnan (Ga.) Cotton Mills, is now serving as an official in the textile-leather division of the National Production Authority.

Rufus K. Smith was recently appointed manager of the full-fashioned division of Chadbourn Hosiery Mills, Inc., Charlotte, N. C. Mr. Smith will coordinate the activities of the finishing plants, planning department, and quality control laboratory of this division.

John M. Bean, Jr., formerly personnel director at Republic Cotton Mills, has been appointed to the same position at Victor-Monaghan Co. Both mills are divisions of J. P. Stevens & Co., Inc.

Subsequent to the announcement of the purchase of Athens (Ga.) Manufacturing Co. by Chicopee Manufacturing Corp., the following officers of Athens were named: **N. L. Smith**, chairman; **G. O. Leinhard**, president; **G. C. Riegger**, treasurer; and **D. D. Quillian, W. W. McLeod, R. L. Swetenburg**, and **W. J. Holman**, vice-presidents.

The Cotton Institute of Canada has elected **J. Irving Roy** president, succeeding the late Walter S. Burrill. Mr. Roy is general manager of Canadian Cottons, Ltd., Montreal, Que. **W. J. Whitehead**, managing director of Wabasso Cotton Co., Ltd., Three Rivers, Que., was chosen first vice-president of the Institute.

Bascom B. Brafford has retired from Cone Mills Corp., Greensboro, N. C., after thirty years of service. **James G. Faucette**, overseer of spinning at Eno Cotton Mills and with the firm 53 years, and **William L. Garner**, with the firm since 1940, have retired also.

Holston Manufacturing Co. has announced the election of **Frederick M. Fisher** as president, succeeding **Morton Boyd**, resigned. **Kenneth H. Burns**, vice-president of the firm's sales agency, Charles Chipman's Sons Co., was elected secretary and treasurer.

S. B. Carson has been named manager and **B. M. Keever**, superintendent, of the new Delta Finishing plant of J. P. Stevens & Co. at Wallace, N. C.

A. Anthony Dreyspool and **Cornelius P. Gearon, Jr.**, vice-presidents at Wamsutta Mills, New Bedford, Mass., were elected directors at a recent stockholders' meeting of the firm.

James Oates, formerly with Cornelius Textile Mill and before that with Dan River Mills, is now superintendent at Aponaug Manufacturing Co., West Point, Miss.

Harold Neuman, Robert Bruce Knitwear Co., was re-elected president of the Pennsylvania District, Knitted Outerwear Manufacturers Association, at its recent annual meeting. Also re-elected were: **Martin Feld**, Novelty Knitting Mills, Inc., first vice-president; **David Rosenblatt**, Highland Knitting Mills, treasurer, and **H. H. Cohen**, executive secretary. The new position of

Personal NOTES ABOUT MEN YOU KNOW

second vice-president is filled by **Gideon Frankil**, Union Knitting Mills.

Bernard F. Gimbel, president of Gimbel Bros., Inc., was recently elected to the board of directors of Burlington Mills Corp. **Charles H. Dyson**, who has been vice-president of the firm's merchandising organization, was elected vice-president as well as a director.

Carrier Corp., Syracuse, N. Y., recently conducted a five-day course on the latest techniques for operation and maintenance of air conditioning and refrigeration equipment. Among those attending were **A. Murphy** and **Paul Tolman**, Textron, Inc.; **Laurent J. Miville**, M. K. M. Knitting Mills; **John Burrage**, Hoover Hosiery Co., and **Gilbert Rogers**, Wiscassett Mills Co.

Lafayette College, Easton, Pa., recently presented the honorary degree of doctor of humane letters to **Robert T. Stevens**, chairman of the board of J. P. Stevens & Co., New York, N. Y.

Robert W. Armstrong, formerly associated with Warner & Swasey, has rejoined Dan River Mills, Inc., as assistant to W. J. Fullerton in the fabric development and research department.

After thirty years with Mercury Mills, Hamilton, Ont., **Arthur R. Vagg** has become associated with the St. Catherines, Ont., branch of Monarch Knitting Mills, as plant manager. Also at Monarch is **E. Klem**, formerly assistant foreman at York Knitting Mills, Toronto.

Clyde H. Beaton, with Bates Manufacturing Co. for seventeen years, has been made plant manager of the firm's Edwards Division, Augusta, Maine.

Edward Schiller, formerly boss spinner at Thomas Woolen Mills, is now with Faith Mills, Averill Park, N. Y., in a similar capacity.

Clarence A. Shibles, with Peerless Woolen Mills, Rossville, Ga., for the past ten years, is now overseer of picking at the Sawyer Mills of American Woolen Co., Dover, N. H.

William Bosquet has left the Puritan Mills of American Woolen Co. to become overseer of dressing at Collins & Aikman, Bristol, R. I.

Obituaries

Anthony A. Keenan, superintendent of carding and spinning at Merrimack Woolen Mills and Bay State Woolen Mills, died on December 10.

William A. Eden, 68, director and a former vice-president of Dominion Textile Co. Ltd., died in Knowlton, Que., early in December.

William P. Drumheller, production superintendent of William Carter Co. for nearly 50 years, died recently at the age of 76.

Aaron B. Quinn, 58, of Greensboro, N. C., died November 28 of a heart attack while in Shelby, N. C. At the time of his death Mr. Quinn was in charge of purchases for J. P. Stevens & Co. at Greensboro.

On December 10 **John R. Hindmarsh**, foreign sales manager for Platt Bros. (Sales) Ltd., of Oldham, Eng., died while on a business trip to Greenville, S. C.

Walter F. Daboll, southern representative for Watson-Williams Mfg. Co., died November 24 in Greensboro, N. C. Mr. Daboll was 70 years of age.

Charles Lehmuth, administrative secretary of the Full-Fashioned Hosiery Manufacturers of America, Inc., died on December 4 at his home in Philadelphia, Pa.

While in Marrakeech, French Morocco, on a business trip, **William B. Bell**, president of American Cyanamid Co., died on December 20 of a heart attack.

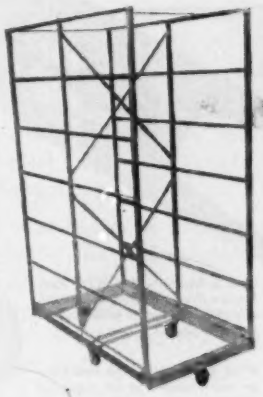
Robert J. Bartholomew, associated with Fletcher Works, Inc., for more than 50 years and currently chairman of the board of directors, died on December 27 at his home in Philadelphia, Pa. Mr. Bartholomew was 78 years old.

Eugene S. Graves, president of Franklin Process Co., Providence, R. I., until his retirement in 1945, died on January 4 at the age of 75.

William A. Levan, 51, general superintendent of Karl Lieberknecht, Inc., died recently after a long illness.

Funeral services were held on January 9 for **G. Ellsworth Huggins**, 72, who died at his home in Montclair, N. J. Mr. Huggins, who at the time of his death was president of Catlin-Farish Co., Inc., Martel Mills Corp., and Henrietta Mills, Inc., was for a number of years industry-wide chairman of the public relations committee of the cotton textile industry.

EXCEL No. 2200 Hosiery Rack Truck



Of sturdy angle construction, electrically welded throughout. Easy rolling standard truck designed to carry 14 boards. Deck gray finish.

Representatives:

Mr. N. W. Eurey—Lincolnton, N. C.
Mr. Paul Eurey—Lincolnton, N. C.
Industrial Suppliers, Inc.
La Grange, Ga.
Fall River Mill Supply Co.
Fall River, Mass.
Mr. Theodore Huston
2601 N. Broad St., Philadelphia, Pa.

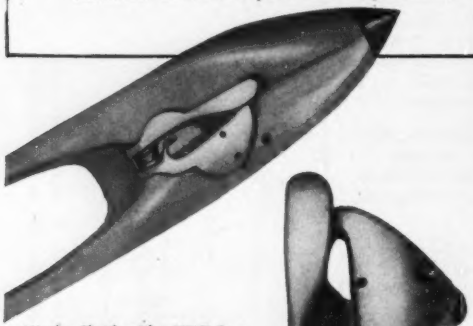
EXCEL
Textile Supply Co.

"Excel Trucks Excel"

LINCOLNTON, NORTH CAROLINA

Keep ahead of your shuttle needs

Give ample protection to your weaving standards, which the Shuttle People help you to maintain, by purchasing your shuttles well ahead of time. Be on the safe side, and certain of those Watson Williams shuttle features on which you particularly depend. Allow at least an extra month for us to meet your exact requirements.



Woolen Shuttle with a W15L Rear Tension Eye, interchangeable with other famous Watson Williams regular and tension eyes.

W15L Rear Tension Eye maintains an even tension at all times on filling. Prevents many troublesome weaving imperfections.

Rayon Shuttle for S5 and S6 Looms with S7X Reverse Wind Eye.

S7X Reverse Wind Center Tension Eye eliminates many rayon filling problems, by holding the thread in perfect alignment and constantly down in place.

WATSON-WILLIAMS MFG. CO.

MILLBURY, MASSACHUSETTS

SOUTHERN REPRESENTATIVES:
Watson and Desmond, Box 1954, Charlotte, N. C.
Arthur J. Bahan, 810 Woodside Bldg., Greensville, S. C.
Greensboro, N. C. office, Jefferson Building

NORTHERN REPRESENTATIVE:
Guy C. Burbank, 32 Beaconsfield Rd., Worcester 2, Mass.

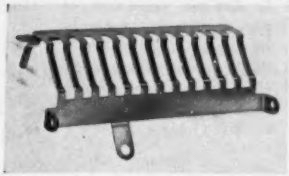
Assures The Best In Hard Chromium Plating

Walhard Walhard Walhard Walhard Walhard Walhard Walhard Walhard Walhard Walhard

This Part Owes Three Extra Lives—

to WALHARD

HARD Chromium Plating!



Part preservation is always a sound idea whether dictated by economy or necessity . . . during the present emergency you can add extra lives to all parts subject to wear by specifying

HARD CHROMIUM PLATING!

Walton and Lonsbury will put their 14 years of experience completely at your disposal—to recommend just *how much* hard chromium you require and how your parts should be finished.

WHAT WALHARD SPECIFY — THEY DELIVER!

USE WALHARD'S 14 YEARS OF EXCLUSIVE EXPERIENCE IN HARD CHROMIUM PLATING TO YOUR ADVANTAGE

WALTON and LONSBURY

The Leading Name In Textile Hard Chromium Plating

78 North Avenue Attleboro, Massachusetts

Assures The Best In Hard Chromium Plating

gh researc
EACH YEAR in hundreds of patent papers, customers' advertisements and technical treatises, the use of the words "Scott Testers" (or their pictures) attests to the fact that these machines are the Standard for methods and terminology in Textile Testing. Scott Testers, Inc., Providence, Rhode Island.
Don't say "Testers," say —
SCOTT TESTERS
Registered Trademark
DECATUR
Scott Testers — Standard of the World

SUPPLIERS News

WHAT THEY ARE DOING

Veeder-Root, Inc., Hartford, Conn., has taken over the office formerly occupied by its distributor, J. T. Quinlan Co., 1775 Broadway, New York, N. Y., and is using it as a direct factory branch in that city. Textile counters, as well as the company's line of general industrial counters, will be sold and serviced out of that office.

Synthron, Inc., Ashton, R. I., has announced the appointment of William J. Patterson, Jr., as field technical representative. Mr. Patterson will represent the company in North and South Carolina, with headquarters in Greenville, S. C.

Mr. Patterson

At a recent directors' meeting, Malcolm D. Shaffner was elected a director of **Saco-Lowell Shops.** Mr. Shaffner has been with the company since 1933.

Completion of a new Canadian plant at Granby Province, Que., was recently announced by **Steel Heddle Manufacturing Co.** Owned and operated by the firm's subsidiary, Steel Heddle Co. of Canada, Ltd., this is the fifth link in a chain of plants throughout the United States and Canada.

The **Atlantic Steel Co.**, Atlanta, Ga., has announced the beginning of a three-year expansion program, destined to increase its steel-making capacity 50% and double its output of rolled products. First phase will be the installation of a 60-ton electric furnace at a cost of approximately $1,500,000.

Ralph J. Cordiner, of New York, was recently elected president of the **General Electric Co.**, succeeding Charles E. Wilson, who is now chairman of the Defense Mobilization Board. Mr. Cordiner has been with GE for 24 years and has been executive vice-president and a director since 1949.

American Cyanamid Co. is planning to lease a 100,000 sq ft building in Chicago, Ill., now under construction, in order to consolidate all its office and warehouse facilities. The building is scheduled for completion in March. The firm has also announced that products of its Industrial Chemicals Division and Coating Resins Department of the Plastics and Resins Division, are now being distributed in Canada by its subsidiary, North American Cyanamid, Ltd. Sales offices will be located at 7335 St. Lawrence Blvd., Montreal, Que., and Royal Bank Building, Toronto, Ont.

Chester A. Gage resigned as vice-president in charge of sales for **National Starch Products, Inc.**, though remaining as director and consultant in the company. Succeeding him as vice-president will be Donald D. Pascal, formerly in charge of Eastern and Pacific Coast sales divisions. S. F. Thune, sales manager of the Mid-Western division, has been made general manager of that division; Lester Klempner, sales manager of the New York division, will also become sales manager of the Eastern division.

Mr. Gage

The Reliance Electric & Engineering Co. has established new branch sales offices in Newark, N. J., and El Dorado, Ark., and has transferred from Buffalo, N. Y., to Syracuse, N. Y., the district office directing

Aren't You Glad You Didn't Miss This Fine Issue?

Every issue of TEXTILE INDUSTRIES is chock full of interesting and informative reading for the mill man who wants to keep abreast of the industry.

Oftentimes a single feature will contain information of far more value than the nominal cost of a year's subscription.

Be sure, therefore, that you renew your subscription promptly. Don't take a chance on missing a single issue of the industry's favorite publication.

IF YOU ARE A NEW READER!

Use the coupon below to enter your own personal subscription.

TEXTILE INDUSTRIES
806 Peachtree St., N.E.
Atlanta, Ga.

I'll gladly pay $2.00 to receive a full year's subscription to T.I. Enter my sub and send the bill.

Name .....

Mill .....

Mail Address .....

.....

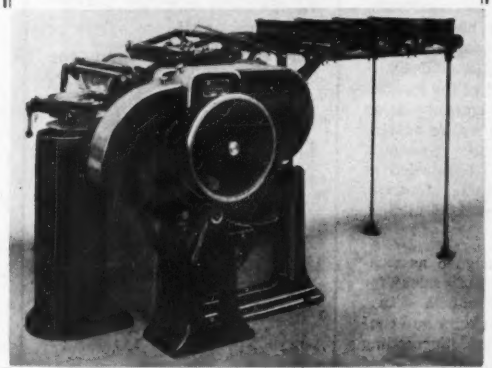
My occupation is:

.....

THE YEARS HAVE PROVEN THEIR QUALITY

OSA

WORSTED MACHINES for SYNTHETICS



Comb Adapted for Rayon

Sant' Andrea, long known as manufacturers of worsted machinery, today are also concentrating on developing machinery to process synthetic fibers. Combing, drawing and spinning of long staple synthetics on the worsted system are playing an ever-increasing role in creating new fabrics . . . Sant' Andrea machinery and technical assistance will help *you* achieve outstanding results in the processing of long-staple synthetic fibers.

S. A. Officina Meccanica

SANT' ANDREA

NOVARA, ITALY

Agents for U.S.A.

ERNEST L. FRANKL ASSOCIATES
22 East 40th Street, New York

QUICK-PERMANENT

Concrete and Wood Floor Repairs

Quick-Floor

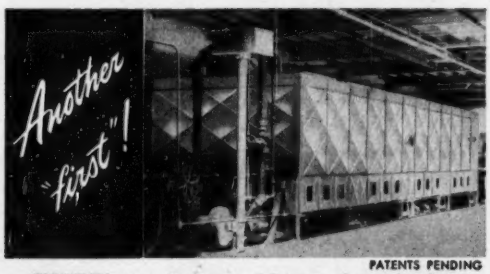
FOR INSTANT . . . PERMANENT PATCHES, repairs, etc. . . . just PLACE and PACK "QUICK-FLOOR" . . . it's done . . . complete and ready to use . . . without delay or interference . . . "QUICK-FLOOR" IS PERMANENT.

MANY 10 YEAR OLD, HEAVY DUTY, INSTALLATIONS still in good shape . . . this means the ANSWER TO Concrete and Wood Floor defects is . . . "QUICK-FLOOR" . . . the original patcher (and surfacer) since 1938.

Order A Drum Today
Results Unconditionally Guaranteed

Quick-Floor
MADE BY DURA-TRED COMPANY

Room 208, 357 N. Central Pk. Blvd.
Chicago 24, Ill. Phone VAn Buren 6-2171



PATENTS PENDING

COMBINES the advantages of 3 types of oven-heating:
(1) INFRA-RED RADIATION (2) CONVECTED HEAT
(3) HEATED AIR—with added turbulence

CARBOMATIC "UNA-RAY" OVEN

Greatly increased efficiency! For example: *40* linear feet of "Una-Ray" Oven equal the productive capacity of *70* feet of a conventional oven-type. Saves thousands of dollars in equipment cost and operational economies. No burning, scorching, spotting or marking of goods. No crocking. No "gas fading" or color migration. Uniform color is insured.

A general-purpose oven (of any capacity needed) that provides accurately-controlled working temperatures up to 550°F. For drying; drying and curing in one operation; resin fusing; Nylon setting, etc. *Write for Bulletin C-2.*

CARBOMATIC CORPORATION • Pioneers in Textile Infra-Red
24-81 47th Street Long Island City 3, N. Y.
Southern Branch: Textile Specialty Co., Greensboro, N. C.
New England Representative: H. E. Linderson, 35 Westminster St., Providence, R. I.

sales throughout northern and western New York. C. B. Allen, formerly in the Detroit office, has been named manager in Buffalo, replacing G. E. Bevis, now a vice-president of the Canadian division; William H. Brehmer will head branch operations in Syracuse; Elwood H. Koontz goes from the New York office to Newark as branch manager, and is joined by F. R. Obenchain as sales engineer. R. C. Suttle of the Cincinnati office has been transferred to El Dorado as manager. A 60-acre plot of land has been purchased near Euclid, Ohio, for erection of another plant for the manufacture of industry type electric motors and accessories, and to house the company's engineering, development, research, and renewal parts departments.

The Thermal Industrial Engineering Co., Denver, Colo., has been appointed district representative for the **Johnson Corp.**, Three Rivers, Mich. Thermal will represent the firm in Colorado, Montana, eastern Wyoming, western Nebraska, western Kansas, and northern New Mexico, with offices at 1932 Cherry St., Denver.

Southern States Equipment Corp., Hampton, Ga., celebrated its 34th anniversary and its 10th year as a Georgia industry on December 7. This firm entered the textile machine field in 1940 with the purchase of the Henderson Foundry and Machine Company. The mechanical division of the company manufactures textile machine specialties and replacement parts for textile machinery; its sales force covers the New England states and the southeastern textile belt.

Eriez Manufacturing Co., Erie, Pa., has appointed the Engineering Products Co., Charleston, W. Va., as sales representative for the full line of Eriez magnetic separation equipment. George Garrett and Ralph Crump are members of the sales force for Engineering Products, with F. E. Anderson as general manager.

Frank P. Barrie has been appointed to succeed Karl H. Inderfurth, resigned, as sales promotional manager for the **Universal Winding Co.** Mr. Barrie has been with the firm for the past 20 years and New England sales agent since 1946. He will be succeeded in New England by Edward C. Parish, Jr.

Tennessee Eastman Corp., subsidiary of **Eastman Kodak Co.**, has been dissolved as a separate corporation. Its business and activities in Tennessee and Texas will henceforth be conducted as divisions of the parent company, according to a recent announcement. The Tennessee division will be known as Tennessee Eastman Co., Division of Eastman Kodak Co. The Texas division will be Texas Eastman Co., Division of Eastman Kodak Co. There will be no change in personnel.

C. G. Gehringer was recently appointed manager of the Louisville,

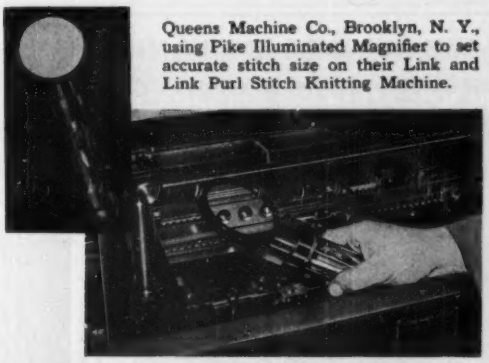
Mr. Gehringer

Ky., branch of **Fairbanks, Morse & Co.** He has been with the firm since 1936 and has been special representative headquartered in Louisville.

SUPPLIERS News
WHAT THEY ARE DOING

C. Spence Purnell has been appointed eastern district manager of the newly formed agency and construction divisions of the **Westinghouse Electric Corp.** The new division will handle sales of Westinghouse products through agent, industrial, and wholesale distributors and will care for the needs of the construction industry. Kenneth L. Horgas and Vernon L. Ingersoll were named as heads of newly formed sections of the eastern district sales organization. Mr. Horgas was made supervisor of the petroleum, chemical and communication section of the industrial division, while Mr. Ingersoll will supervise the mining, paper, and textile section.

A new factory branch store at 5020 Centre Ave., Pittsburgh, Pa., is now in operation by the **Link-Belt Co.** for better service to the industries in the Pittsburgh area. The building provides ample space for stocking Link-Belt power transmission and materials handling products and



Queens Machine Co., Brooklyn, N. Y., using Pike Illuminated Magnifier to set accurate stitch size on their Link and Link Purl Stitch Knitting Machine.

ELIMINATE "GUESS WORK"!

USE THE PIKE ILLUMINATED MAGNIFIER TO SET ACCURATE STITCH SIZE

Advantages to Machine Manufacturers and Users!

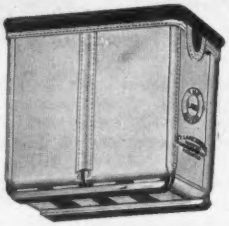
Magnification provides 3 times normal size view of work • Built-in light brightly defines part being examined • Full 3½" lens gives wide field of vision • Easy to use—it's portable—batteries in handle • Valuable for all inspection work on textile machines

Battery Model—$7.50 Immediate Delivery

Send order or write for free illustrated folder.

E. W. PIKE & COMPANY

492 NORTH AVE. ELIZABETH, N. J.



Style 20B

Doffing and Yarn Handling Box

Ask about our new FILLING-HANDLING system. Eliminates dumping and waste.

Style 28

Narrow Aisle Truck

Light, easy running. Snag proof.

LANE

Canvas

Boxes and Trucks

Smooth—light, long lived.

Write for Catalog No. 1

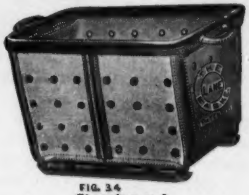


FIG. 34
Steaming and Conditioning Basket

Brass grommets afford free and uniform ventilation. Snag proof.

Style 27

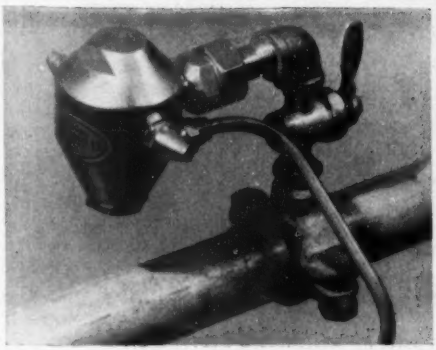
Standard Type Truck

Lane trucks offer a variety of caster equipment, both iron and rubber.

W. T. LANE & BROS., Inc. Manufacturers Poughkeepsie, N. Y.

THE NEW INACO MULTI-NOZZLE ATOMIZING HEAD

OUR ANSWER TO YOUR PROBLEMS OF HUMIDIFICATION



Efficient Economical Flexible Trouble-Free

WE ARE EQUIPPED TO HANDLE YOUR PROBLEMS IN:

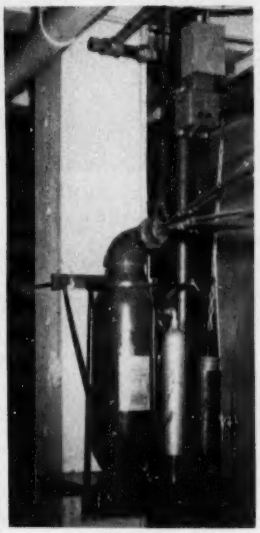
REFRIGERATION
VENTILATING
HUMIDIFYING
AIR HANDLING
EVAPORATIVE COOLING
HEATING

Write today for our bulletin which shows you the many advantages of the INACO SYSTEM.

INDUSTRIALAIRE COMPANY
INCORPORATED
1600 Hutchinson Avenue Charlotte, North Carolina

KEEFE Automatic Fire Extinguishing System

Again First in the Field



● The greatest advance in fire protection for the textile industry since we introduced dry chemical seven years ago. Eliminates water and other damage — ideal for concealed areas, waste machines, pickers, ducts, and similar costly hazards. Installations in service over past four years have proven highly successful.

Write for further information.

KEEFE AND COMPANY

295 HAYDEN ST., N.W. ATLANTA, GA.

serves as headquarters for the increased Pittsburgh personnel.

A complete line of clearer boards and clearer rolls is now being manufactured and distributed by **Gibson Textile Specialty Co.**, Decatur, Ga., a firm operated by W. C. Gibson, Sr., who has been contacting textile mills for over 25 years.

DuPont Co. has announced the appointment of Malcolm G. Jones as director of sales for the Nylon Division, to succeed Warren A. Beh, resigned. Mr. Jones' former position as director of production for the Acetate Division is now held by A. B. Walmsley, Jr.

At a recent directors' meeting, Robert I. Dalton, Sr., was elected a vice-president of the **Whitin Machine Works.** Mr. Dalton will, however, continue to serve as southern agent, with headquarters in Charlotte, N. C.

At the recent annual meeting of **The Electric Industrial Truck Assn.**, C. B. Cook, vice-president and export sales manager of **The Elwell-Parker Electric Co.**, Cleveland, O., was named president, succeeding M. W. Heinritze. Elmer F. Twyman, vice-president in charge of the Philadelphia division of **Yale & Towne Manufacturing Co.**, was made vice-president, and William Van C. Brandt, the Association's managing editor, was re-elected secretary-treasurer.

A southern office has been established by **Bryant Chemical Corp.**, with John W. Bryant as representative. Mr. Bryant, whose address is Box 2301, Spartanburg, S. C., will travel with the complete line of Brytex specialties.

Joseph A. Amato and Frank J. Kelly were recently elected vice-presidents of **James Talcott, Inc.**, factors. In addition, Francis Moscrop, comptroller, was elected assistant treasurer and comptroller, and Robert J. England was advanced to assistant vice-president. Frederick J. Hunter, oldest employee in length of service, was honored at the company's annual Christmas dinner on the eve of his 50th anniversary with the firm.

A new office at 201 South Carolina National Bank Building Annex, Greenville, S. C., has been established by **A. M. Tenney Associates, Inc.** Alan A. Clow and Archer E. D. Booker, sales representatives, will be located at the new address. Mr. Clow's former office in Atlanta, Ga., and Mr. Booker's in Greensboro, N. C., have been discontinued. Leslie L. Cobb and Vernon Kirkman will continue to service Eastman fibers in the Greenville and Georgia territories and will be located in the new office in Greenville.

John G. Bucuss, general manager, strapping division, **Acme Steel Co.**,

Mr. Bucuss

was recently elected president of the Materials Handling Institute for 1951.

Property has been acquired in Anderson, S. C., by **Owens-Corning Fiberglas Corp.**, for construction of a new glass yarn mill. It is reported that there will be equipment and facilities for employment of about 200 persons. Owens-Corning is also planning an addition to its plant at Newark, Ohio, to cost approximately $30,000.

SUPPLIERS News — WHAT THEY ARE DOING

Holloway Manufacturing Co., formerly located at 1155 Victory Drive, Atlanta, Ga., has moved to 110 East Taylor St., East Point, Ga., according to Lynn Holloway, owner.

The organization of William J. Moore, Greenville, S. C., has been appointed representative for **Chapman Electric Neutralizer Co.**, Portland, Me., in North and South Carolina, Georgia, and Alabama.

Synthane Corp., Oaks, Pa., has moved its New York district office from 233 Broadway, New York City, to larger quarters at 125 Parkway Road, Bronxville, N. Y. The change is designed to provide better parking facilities and greater convenience for customers and salesmen. The New York sales staff covers New York, New Jersey, and southern Connecticut.

HOW ANDERSON SHIELDS INCREASE SPINNING ROOM EFFICIENCY

Spinning rooms using Anderson Shields save time and money, and prevent disruption when unnecessary breaking, chipping, and splitting of bobbins and spools is avoided. In a year's time these items alone can amount to a surprising sum . . . Insist on Anderson and get the best protection metal shields afford . . . Watch your spinning room efficiency increase!

TEXTILE SHIELD CO., INC.

Metal Protection for Wood Turnings

J. N. ANDERSON, *Treas.*

LAWRENCE, MASS., U.S.A.

"Marshalling the forces of advertising to help solve national problems and to make democracy work better . . ."

DO YOU KNOW that the forces of advertising are engaged today in one of the world's greatest jobs of mass education . . . *in the public interest?*

Do you know that these forces for good have been released through the vision and unselfish cooperation of American business — advertisers, advertising agencies, media owners and others?

Hundreds of advertising agencies have volunteered their planning and creative time and facilities. Artists, cartoonists, photo-engravers, printers, typographers and others have contributed their services.

Media owners have donated millions of dollars in space and time. National and local advertisers have sponsored and paid for many millions of public service advertising messages.

As a result, the American people are being alerted as never before to the dangers which threaten from within and from without . . . the dangers of ignorance about our American economic system, intolerance, tuberculosis, school and teacher shortages, etc.

And, at the hub of this great public service effort is *your* organization . . . The Advertising Council.

Advertisers and Media Owners . . . Your Help is Needed!

Right now The Advertising Council has 14 programs in operation. The success of these programs depends on the public spirited and generous cooperation of advertisers and media owners. *Your* help, in the form of space or time donations will mean a lot to us. And remember . . . *What helps America helps you!*

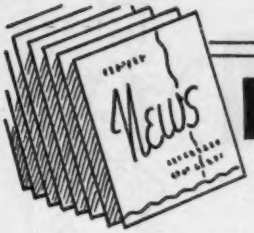
Yours for the Asking

Write for a copy of Booklet No. 15. It will give you pertinent information about The Advertising Council . . . how it started . . . what it is . . . what it does . . .Or ask for material on specific campaigns. Address: — The Advertising Council, 25 West 45th Street, New York 19, N. Y.

Published in the public interest by

TEXTILE INDUSTRIES

*A NON-PROFIT ORGANIZATION FORMED TO UTILIZE ADVERTISING IN THE PUBLIC GOOD



HELPFUL Booklets FREE

Here is the "cream of the crop" of literature on textile subjects as prepared by TEXTILE INDUSTRIES advertisers to aid in mill operation and management. These reference books and catalogs are free for the asking and there is no obligation involved. Read through the list carefully for booklet on the subject or new Equipment in which you are interested. Then fill in the numbers of those desired on the coupon on page 242 and mail it to TEXTILE INDUSTRIES. ("First Listings" shown below are not confined solely to TEXTILE INDUSTRIES advertisers).

This service is restricted to those engaged in operation and management of textile industries

2-1. Conveyor and Elevator Belting. New 16 page information bulletin covering all types of conveyor and elevator belting. Contains a discussion of each of the various types of belting and suggestions for their application; complete with all necessary tables, charts, and formulae for the selection of the right type of belt for the application. Thermoid Co., Trenton, N. J.

2-2. Pre-Shaped Steel. Bulletin AM-100 describes a new product being supplied by the company—steel bar stock, cold drawn in special sections to fit specific purposes. Pre-shaped feature eliminates many machining operations in the production of steel parts for machines and other products, according to the bulletin, and drawings of some typical pre-shaped steel sections are shown. A. Milne & Co. 745 Washington St., New York 14, N. Y.

2-3. Dry Chemical Feeder. Bulletin 35-G5 describes this company's new Belt Gravimetric Chemical Feeder, its operation as well as a thorough description of each of its component parts of this small size, high capacity dry chemical feeder. Illustrations and typical installations. Omega Machine Co., 345 Harris Ave. Providence, R. I.

2-4. Mechanical Packings. New thirty-two page catalog guide graphically illustrates and describes this company's mechanical Packings. Process Packing is described as self-forming, self-lubricating, self-sealing, and included is a simplified recommendation chart. Flexrock Company, Packing Division, 36th & Filberts Sts., Philadelphia, 4, Pa.

2-5. Synthetic Organic Chemicals. New 52 page catalog presents in detail the physical and chemical properties, latest specifications, applications and shipping and handling information on Niacet's line of chemicals. Niacet Chemicals Division, 977 Niagara Bldg., Niagara Falls, N. Y.

2-6. Right Angle Pump Guides. New bulletin B-140-1 describes the construction features of the Peerless right angle gear head for vertical pumps and includes complete sectional drawings and dimensions, details of the flexibile shafts for connecting driver to the pump head, horsepower ratings of the various size heads and other engineering data. Described as the best means of driving a vertical pump with a horizontal driver. Peerless Pump Division, 301 West Ave. 26, Los Angeles 31, Calif.

2-7. Single Drum Hoists. Bulletin 76X describes the complete line of Joy single drum, multi-purpose hoists, with complete description and specification for hoists with capacities from 500 to 3500 pounds and driven by Turbinair, Pistonair, Electric, or Gasoline Engines. Handy Select-O-Hoist chart simplifies the choice of any hoist to fill a particular need. Joy Manufacturing Co. Oliver Bldg., Pittsburgh 22, Pa.

2-8. Reed - Cleaning Procedure. Service report describes new reed-cleaning procedure which removes oil, grease, dye, sizing, weaveroom dirt and rust from loom reeds in one operation. Also described is a special anti-rust treatment designed to protect newly-cleaned reeds from rust while they are in storage awaiting re-use. Oakite Products, Inc., 1260 Thames St., New York 6, N. Y.

2-9. Card Stripper. Brochure listing the advantages and savings derived from the Saco-Lowell continuous card stripper. 75% to 90% annual return on the investment, on two-shift operation, according to the Brochure. Production advantages pictorially described. Saco-Lowell 60 Batterymarch St., Boston 10, Mass.

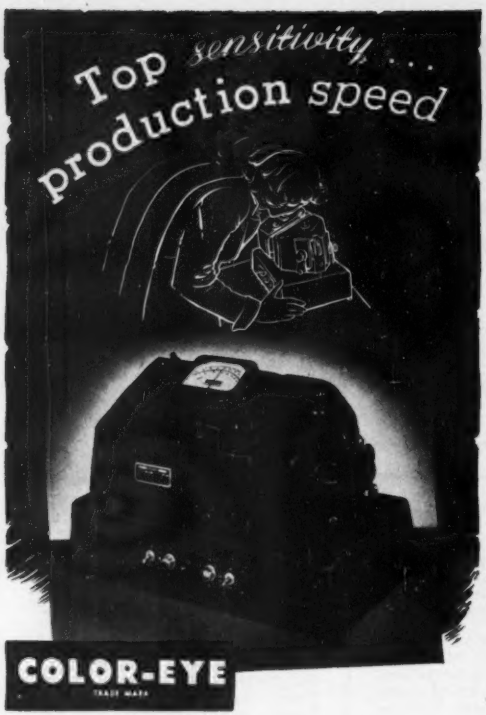
2-10. Electric Pallet Truck. Eighteen page book in color showing every detail of the new and improved Model "W" Towmotor Electric Pallet Truck, described as a compact, powerful, pallet type unit specially engineered to handle loads up to 4,000 pounds. New features described and beautifully illustrated. Towmotor Corporation, 1226 E. 152nd. St., Cleveland 10, Ohio.

2-11. Chemical Research. New booklet describing the origin and objectives of the Chemical Research Department of American Viscose Corp. Description of the work carried on by this organization and illustrations of equipment and facilities used. American Viscose Corp., 305 Fifth Ave., New York 1, N. Y.

2-12. Uni-Pull Drive Manual. This book enables the reader to select, without any calculation, the proper size of flat leather belt, i.e., width, thickness and length, together with pulleys of the correct dimension, both driver and driven, to transmit power from a motor of a given horsepower and speed to a machine to be operated at a prescribed speed. American Leather Belting Association, 41 Park Row, New York 7, N. Y.

2-13. Fire Protection. Brochure describing the Keefe Dry Chemical extinguisher as being ideal for Textile and Rayon industries. Principles involved in the dry chemical method of extinguishing fires along with the advantages discussed pictures illustrating methods of use. Keefe & Co., 295 Hayden St. N. W., Atlanta, Ga.

2-14. Electric Hand Truck Batteries. Nine new battery specification sheets covering batteries used to supply power for "Walkie" trucks. Each sheet designates battery type, capacity, dimensions, and weight for each manufacturer's truck models. These specifications aid in quickly and easily selecting the right battery for each truck, and for the job it must do. Gould-National Batteries, Inc., Trenton 7, N. J.



color-eye system for color control

Simple electronic and optical system matches dye colors five times better than human eye. A fast production instrument . . . yet extremely precise. COLOR-EYE is guaranteed better than the color-matching method you are now using. Write for details.

Special accessories for Color-Eye System make dye color-matching easier

Viewer — permits viewing of sample in instrument . . . insures proper presentation.

Textile Sample Holder — convenient and rapid . . . special reflecting models for hosiery and net fabrics.

Reference Standards — black and white glass standards for color work . . . special neutral standards for checking stability of your own color standards.

IDL

Consultation — Research — Development — In the field of measurement and control

INSTRUMENT DEVELOPMENT LABORATORIES
INCORPORATED
163 Highland Ave., Needham Hts. 94, Mass.

Ol' Devil Static!
Static in warpers, slashers, cards, drawing frames and other textile machinery is costly. The Simco "Midget" Static Eliminator permits maximum production, improves quality, increases profits... safely and inexpensively.
SIMCO
"Midget"
WANT FACTS ABOUT STATIC? WRITE TODAY FOR SIMCO'S ILLUSTRATED FOLDER "T-7"!
the SIMCO company
920 Master St., Philadelphia 22, Pa.

LAMBETH PRODUCTS
FOR SPINNING, TWISTING, SPOOLING, WEAVING
Basket weave spinning tape
weave spinning tape
Herring-bone
LAMBETH RUBBER LUG STRAP
Basket weave twister & spooler tape
Double loop hook bands for cards, twisters, spoolers, etc. (all lengths and diameters)
Mule ropes all sizes diameters
Braided spindle banding for mules, etc.
LAMBETH ROPE CORPORATION
Plants at New Bedford, Mass. and Kings Mountain, N. C.

GENERAL ECONOMIC, MANAGEMENT . . .

4. HOW FACTORING CAN INCREASE PROFITS—Describes how factoring works out in keeping clients' capital liquid and attitude of factor toward checking credits, including typical balance sheet.—COMMERCIAL FACTORS CORP., New York City.

5. FACTORING AND FINANCING — Illustrated booklet on how factoring works, cost and credit information.—TEXTILE BANKING COMPANY, New York, N. Y.

8. "WASTE REDUCTION AND CONTROL"—12-page illustrated booklet giving primary waste factors; how to calculate cost of departmental waste; actual waste figures from mills; contains survey of waste practices. — SOUTHEASTERN ENGINEERING CO., West Point, Ga.

10. "LABOR AND MANAGEMENT BENEFIT BY INDUSTRIAL ENGINEERING PRINCIPLES"—8 page illustrated folder outlining principles of industrial engineering as they apply to textiles.—AMERICAN ASSOCIATED CONSULTANTS, INC., New York, N. Y.

11. FLETCHER JUNIOR "SUPER-SELF-BALANCING" EXTRACTOR—Illustrated folder describing this new extractor with the highly efficient self-balancing arrangement which uses steel springs instead of rubber buffers.—FLETCHER WORKS, INC., Philadelphia, Pa.

12. CONDENSED LISTINGS—8 page pocket sized booklet listing by plant flow the machinery and mill supplies available. Designed to help purchaser in grouping his orders to greatest advantage.—ATKINSON, HASERICK & CO., Boston, Mass.

13. BROCHURE describing financial service to speed turnover of working capital; credit service for sales expansion and credit loss elimination.—WILLIAM ISELIN & CO., INC., New York, N. Y.

16. TEXTILE RESEARCH — Booklet describing Research Department's commercial scale facilities for cotton spinning, worsted spinning, etc. Explains organization and function of department.—AMERICAN VISCOSE CORP., SYLVANIA DIV., New York, N. Y.

18. FACTORING—Information available on how factoring works to aid client in keeping capital fluid and to avoid credit losses. Inquiries regarding these services welcome.—L. F. DOMMERICH & CO., 271 Madison Ave., New York 16, N. Y.

PLANT AND PLANT MAINTENANCE . . .

102. "TANK TALK"—Sixteen page booklet of illustrations showing various types of elevated steel tanks constructed and erected by manufacturers, as well as stand pipes, reservoirs, storage and high pressure vessels, cylinders, along with helpful technical data. Also a list of what a few of the cotton mills, etc. said.—R. D. COLE MANUFACTURING COMPANY, Newnan, Ga.

103. HUMIDIFICATION, EVAPORATIVE COOLING—Bulletins available displaying AMCO automatic self-cleaning atomizers, controls, and evaporative cooling equipment.—AMERICAN MOISTENING CO., Providence, R. I.

105. DRY CHEMICAL—Brochure describing the Keefe fixed-system dry chemical fire extinguisher which is designed to control waste fires. Ideal for concealed areas where fires are likely to occur.—KEEFE AND COMPANY, Atlanta, Ga.

106. MAPLE FLOORING — Booklet describing finishing of Northern Hard Maple Flooring—list of M.F.M.A.-approved heavy-duty floor finishes. — MAPLE FLOORING MANUFACTURERS ASSOCIATION, Chicago 1, Ill.

108. CARD STRIPPER—Portable dustless card stripper described in bulletin 1608. Advantages of dustless stripping when combined with thorough brush stripping. Used alone or with other systems discussed.—PARKS-CRAMER CO., Fitchburg, Mass., and Charlotte, N. C.

117. CLEANING SYSTEMS — Booklet entitled "Certified Climate and Cleaning Systems" gives latest information on systems. Products and uses fully discussed with two story layout of Certified Climate central station air conditioning system.—PARKS-CRAMER CO., Fitchburg, Mass., and Charlotte, N. C.

119. MOPPING EQUIPMENT—Complete catalog and circulars containing information on the many sizes and styles that can be had.—S. C. LAWLOR CO., Chicago, Ill.

123. STAINLESS STEEL TANKS — Bulletin CHR-50 illustrates the half round stainless steel horizontal jacketed tank with horizontal agitator and scraper blades, used for size cooking. Bulletin JS-50 shows various stainless steel jacketed tanks, and SS-50 shows single shell tanks.—METAL GLASS PRODUCTS CO., Belding, Mich.

127. SOLENOID VALVES—Bulletin "V" lists sizes from ⅛ inch to 3 inches; valves for normally open or closed service; stainless steel or Jenkins disc seats; three way solenoid valves, etc.; typical installations.—THE JOHNSTON CORP., Three Rivers, Mich.

128. INSECTICIDAL PAINT—Bulletin describes new architectural type paint into which DDT crystals have been incorporated assuring insect control.—SONOCO PRODUCTS CO., Paint and Lacquer Div., Hartsville, S. C.

132. SANDING AND FINISHING—With Coated Abrasives, 88 page illustrated booklet on modern production methods, including information on the use of "Texalox" Cloth take-up roll covering and Fillet Cloth for sharpening cardcloth.—THE CARBORUNDUM CO., Niagara Falls, N. Y.

137. PUMPS AND COMPRESSORS—Bulletin P.Q.-11 presents the standard types of Gardner-Denver air compressors, pumps, and rotary drilling equipment (steam engines, steam and power pumps) in a brief and comprehensive manner to enable the prospective user to select the size and type for specific needs.—GARDNER-DENVER CO., Quincy, Ill.

142. ALUMINUM SCAFFOLDS—Circulars describing features of rolling scaffolds designed for use in weave rooms, spinning rooms, etc.—UP-RIGHT SCAFFOLDS, Berkeley, Calif.

159. HUMIDUCT UNIT AIR CONDITIONING—Described in Catalog Section 4A. For humidifying, cooling, heating, ventilating or air filtering, in any combination.—THE BAHNSON CO., Winston-Salem, N. C.

161. MODERN METHODS OF TEXTILE FLOOR MAINTENANCE—Illustrated treatise on the history of floor cleaning in textile plants and a detailed description new methods for reducing floor cleaning costs as well as preserving textile mill floors.—G. H. TENNANT COMPANY, Minneapolis 11, Minn.

164. DRY SCRUBBING TEXTILE MILL FLOORS—With Holt combination Sanding and Steel Wooling machines and Selig's Flexseal-Floriene method. Literature describes system and reveals economy made possible by reduced costs in labor and material consumed.—THE SELIG CO., Atlanta, Ga.

165. AIR CONDITIONING BOOKLET. Twenty-page, illustrated booklet describing simplified procedures for effective cleaning and maintenance of air conditioning and humidifying equipment.—OAKITE PRODUCTS, INC., New York 6, N. Y.

170. WHY IT PAYS TO ANCHOR YOUR TEXTILE MACHINES WITH UNISORB—Illustrated booklet discussing control of vibration and noise and how UNISORB reduces maintenance costs.—THE FELTERS CO., Boston, Mass.

173. BLOWERS AND EXHAUSTERS—Bulletin No. 3014-D describes types "E" and "RE" electric blowers and exhausters. Uses and full description of each with detail drawings.—BUFFALO FORGE CO., Buffalo 5, N. Y.

179. BETTER WAYS—Form 2020, condenser catalog of standard and special model Toledo Industrial Scales that are being used in receiving, shipping, and production operations by all industries including the textile field.—TOLEDO SCALE CO., Toledo, Ohio.

181. AIR FILTRATION AND DUST CONTROL—Booklet on atmospheric control, including engineering data on systems.—AMERICAN AIR FILTER CO., INC., 215 Central Ave., Louisville 8, Ky.

POWER TRANSMISSION, MOTORS, BELTING, LUBRICATION . . .

204. G-E MOTORS—Bulletin GEA-5383 contains information on the new line of life-time lubricated, unit-bearing FHP motors.—GENERAL ELECTRIC COMPANY, Schenectady 5, N. Y.

205. AUTOMATIC PRODUCTION CONTROL—Bulletin GN-467 on automatic speed control of many machines and processes through Variable Speed Equipment with mechanical and hydraulic automatic controls. Contains many illustrations, drawings and complete description of many applications.—REEVES PULLEY COMPANY, Columbus, Ind.

207. TRICO OILER INSTALLATION—Twelve interesting pages of actual "on the job" photos of Trico oiler applications on nationally recognized machinery and equipment.—TRICO FUSE MFG. CO., 2948 N. 5th St., Milwaukee 12, Wisc.

210. MOTOR BEARINGS—The 1950 edition of Johnson's Industrial Bearing Catalog is now available. Shows several new motor bearings added, along with the standard stock sizes.—JOHNSON BRONZE CO., New Castle, Pa.

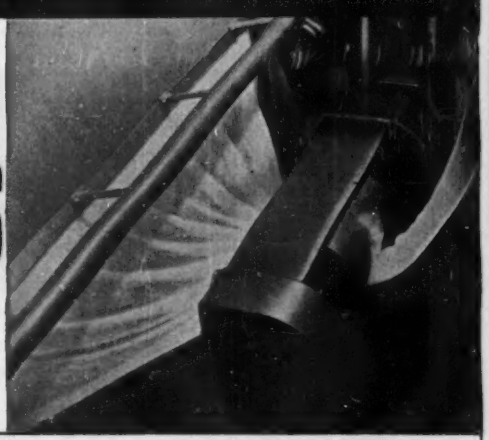
216. LEATHER BOOKLET NO. 292—Attractive book illustrating and describing BONDARON Special Tanned Leather as used in various forms such as Check Straps, Solid Round Leather Belting, Flat Belting.—CHAS. BOND CO., Philadelphia, Pa.

10.000.000 CARDING POINTS NEED PERFECT GRINDING ROLLS

CONSULT THE CARD-GRINDING SPECIALISTS

DRONSFIELD'S

TRAVERSE WHEEL GRINDER Nº 120



SOLE AGENTS FOR DRONSFIELD'S MACHINERY :-

JOHN HETHERINGTON & SONS INC.

BOSTON · MASS.

SOLID GRINDING ROLLER Nº 112

DRONSFIELD BROTHERS LTD · OLDHAM · ENGLAND

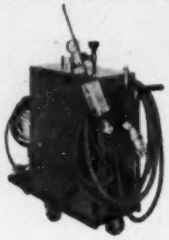
AT LAST—

A CLEANER BUILT EXPRESSLY FOR TEXTILE MILLS

SPEEDYLECTRIC

STEAM-JET CLEANER JC-20

cuts costs 25% or more



Designed by textile men for textile mills, the SPEEDYLECTRIC JC-20 will meet *all* your requirements . . . for speed . . . for efficiency . . . for economy. Users actually report savings of *75%—and more!* Features like these tell why:

Compact and Portable—16" x 40" . . . ball bearing swivel casters—turn on a dime!

Power requirements—20 KW—readily available in mills . . . 550, 440, 220 volts, 3 phase.

Safe—A.S.M.E. Code . . . no flames, fumes or fire hazards . . . no tubes or coils.

Easy to operate—Steam at the flick of a switch—steam and solvent under push button control at lance.

Effective—High temperature dry steam atomized with solvents blasts off oil, grease, lint and caked on dirt. For further proof that the SPEEDYLECTRIC Steam-Jet Cleaner JC-20 can make important savings in your plant, write today for Bulletin 214-2.

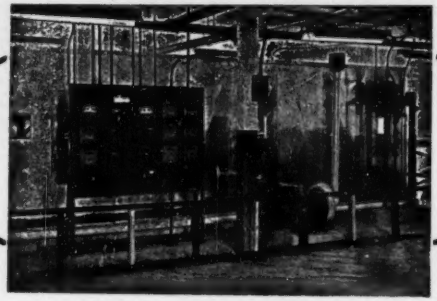
LIVINGSTONE ENGINEERING CO.

Manufacturers of Steam Boilers and Steam-Jet Cleaners

100 GROVE ST., WORCESTER 5, MASS.

INCREASE PRODUCTION . . . REDUCE COSTS

DRYING & CURING EQUIPMENT with PROCESS HEATING



Side view of two zone drying and curing oven

- Tenter Frame Housings
- Piece Goods Dryers
- Print Goods Dryers
- Slasher Dryers
- Latex Dryers and Curers
- Chemical Dryers
- Skein, Yarn and Stock Dryers
- "INFRED"—the most efficient gas fired radiant burner available

Engineers and Constructors of All Types of Fast Drying Equipment for the Textile Industry

Write for Complete Literature Choice territories open for qualified representatives

PROCESS HEATING, INC.

Industrial Heating Engineers

48 Herkimer Place — Brooklyn 16, N. Y.

---

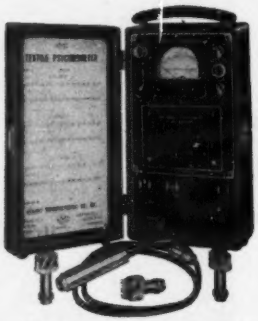
moisture content measured *on the spot*

by the new

LOW PRICED KEARNY

Midget

PSYCHRO-METER



Especially designed for *practical spot checking* of moisture in all phases of the textile industry.

Suitable for Cotton, Wool, Worsted, Rayon, Mixtures and other Textiles, or raw materials, yarns and fabrics.

Accurate within a tolerance of one-half of one percent.

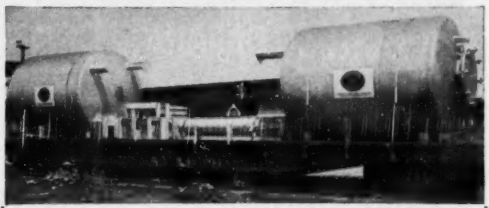
LET US SHOW YOU HOW

Ask for Free Demonstration

KEARNY MANUFACTURING CO., INC.

Kearny, N. J. — Greenville, S. C.

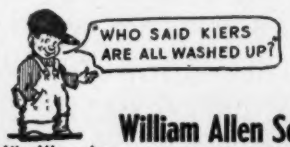
Authorized agents all over the world



Allen-Worcester Kiers on the Move

If You Do:-

Thread and Yarn . . . Heavy Goods for Vat Dyeing . . . Raw Stock . . . Curtain Goods . . . Toweling . . . Knit Goods . . . Varying Lots.



Allen Worcester

William Allen Son's Company

Worcester, Massachusetts

218. BALL BEARINGS FOR TEXTILE MACHINERY—A 40-page catalog illustrating Fafnir Ball Bearing units for replacement or new applications in all phases of textile processing.—THE FAFNIR BEARING CO., New Britain, Conn.

220. MOTOR SELECTION—Booklet B-3075-C on different types of fractional horse power motors, and factors in selection of right motor for the applications. Large chart gives complete data on small motors, horsepower, speed, torque, etc.—WESTINGHOUSE ELECTRIC CORP., Pittsburgh, Pa.

223. ELEVATOR SELECTION—How to integrate the selection of freight elevators with the material handling problem answered in 44-page booklet B-4402 on freight elevators.—ELEVATOR DIVISION, WESTINGHOUSE ELECTRIC CORP., Pittsburgh, Pa.

225. AUTOMATIC SPEED CONTROLS—Booklet No. 2349 contains photos and operating diagrams of applications of company's new controls available in four basic types—electronic, hydraulic, pneumatic, and mechanical.—LINK-BELT CO., 307 N. Michigan Ave., Chicago, Ill.

226. LEATHER BELTING CALCULATOR—Handy and attractive calculator for determining belt, speeds, horsepower per inch of belt width, etc., will be sent free on request.—J. E. RHOADS & SONS, Philadelphia, Pa.

240. LEATHER BELTING—Illustrated booklet on how to select, install and maintain leather belting. Efficient transmission performance, with minimum maintenance, and maximum service life described.—SOUTHERN BELTING CO., Atlanta, Ga.

244. TEXACO SPINDURA OILS—Folder on lubrication for all types of spindles, based on actual tests.—TEXAS CO., New York City.

254. METERED LUBRICATION—Bulletin 6A has 12 illustrated pages showing how central lubricating systems are applied to combers, roving frames, winders, knitters, looms, etc.—BIJUR LUBRICATING CORP., Rochelle Park, N. J.

283. NEEDLE ROLLER BEARING—Catalog Engineering and Application Data Edition 32A contains full data on selection of proper Needle Roller Bearings and outlines uses of such in various commodities including textile uses, types, installations, lubrication, etc.—TORRINGTON COMPANY, Torrington, Conn.

285. SERVICE PROCEDURE FOR BALL BEARINGS—Fully illustrated instructions on the right and wrong ways of dismounting, cleaning, lubricating and replacing ball bearings in any machine.—NEW DEPARTURE DIV., GENERAL MOTORS CORP., Bristol, Conn.

271. CARDING, SPINNING AND WEAVING LUBRICATION—Informative bulletin describing advantages of NON-FLUID OIL over ordinary lubricants for the lubrication of carding, spinning and weaving machinery.—NEW YORK AND NEW JERSEY LUBRICANT CO., New York, N. Y.

275. HYATT ROLLER BEARINGS—A 16-page bulletin giving details of the application of roller bearings in all types of textile machinery.—HYATT BEARINGS DIV., General Motors Corp., Harrison, New Jersey.

278. SPEED CONTROL—Bulletin 20B06orG describes Texrope variable speed drives — ALLIS-CHALMERS MFG. CO., Milwaukee 2, Wis.

283. CONTINUOUS OIL GROOVER—Bulletin available describing this unit which provides fast, accurate grooving on bearings of every size and type. Maximum production at minimum unit cost discussed.—THE WICACO MACHINE CORP., Philadelphia 44, Pa.

290. MOYNO "PROGRESSING CAVITY" PUMPS—Bulletin 35-A describes the adaptability of these pumps to handling acids, sizing, and other materials used in textiles.—ROBBINS & MYERS, Pump Div., Springfield, Ohio.

INSTRUMENTS, STEAM SPECIALTIES . . .

300. TEXTILE DIGEST—12-page manual reviewing performance-proved procedures for improved handling of more than 60 essential cleaning and related operations in textile mills.—OAKITE PRODUCTS, INC.

301. JOHNSON ROTARY PRESSURE JOINTS—Bulletin describing the rotary pressure joint which requires no packing, no lubrication and no adjustment, giving installation and maintenance instructions, types, sizes, dimensions and prices. — THE JOHNSON CORP., Three Rivers, Mich.

302. INSTRUMENTS—Illustrated catalog covering uniformity analyzer, acoustical measuring devices, and other non-destructive industrial measuring instruments. Illustrated brochure describing hypersonic equipment for both laboratory and pilot plant use in the field of ultrasonics.—BRUSH DEVELOPMENT CO., Cleveland 14, Ohio.

310. RECORDING GAUGES—Booklet on the "Series 500" line of recording gauges. Complete information on pressure gauges for ranges 0 to 2 inches of water to 0 to 10,000 P.S.I., vacuum gauges, low range draft and pressure gauges, barometers, etc.—THE BRISTOL CO., Waterbury 20, Conn.

311. PIPING POINTERS—Industrial maintenance book covering installation and handling of piping, valves, fittings. Well illustrated, practical tips. — CRANE CO., Chicago, Ill.

314. MOISTURE CONTENT CONTROL—Bulletin F-3156 giving details of features and benefits of moisture equipment designed for slashers and textile applications. — BARBER-COLMAN CO., Rockford, Ill

315. CONTROL INSTRUMENTS FOR TEXTILE PROCESSES—32-page illustrated booklet describing controls for such processes as slashing, dyeing, bleaching, kier boiling, drying, air-conditioning, etc. — MINNEAPOLIS-HONEYWELL INDUSTRIAL DIV., Philadelphia, Penna.

316. HYDRAULIC POWER UNITS—Literature describing hydraulic unit, motor, pump, reservoir, valving a small compact unit for operating of hydraulic calenders, presses, feeds, controls, etc.—B. F. PERKINS & SON, INC., Holyoke, Mass.

321. RED-RAY BURNERS—Bulletin describing use of Red-Ray Burners in preheating and partial drying to increase capacity of frame.—RED-RAY MFG. CO., New York, N. Y.

324. STROBOTAC—Informative reprint, "Strobotac Boosts Efficiency in Woolen and Synthetic Mills."—GENERAL RADIO CO., Cambridge 39, Mass.

327. PRESSURE REGULATORS—Bulletin P-100 describing equipment for slashers to provide squeeze roll pressure that can be easily adjusted to the correct value for any warps being sized.—NORCROSS CORP., Newton, Mass.

329. COUNTERS — Leaflets describing Yardage Counters, Hank Clocks, Pick Counters—many types available for every make frame, loom, etc.—WAK INDUSTRIES, Charlotte, N. C.

330. TACHOMETER — Bulletin describes 200 models of indicating tachometers for permanent installation showing speeds in RPM's, yards per minute, feet per minute, etc., including portable (hand) tachometers. — JONES MOTROLA CORP., Dept. T.I., Stamford, Conn.

333. HOSIERY DYEING—Bulletin 96188 with drawings and illustrations, explains automatic control system for hosiery drying based on time and temperature.—TAYLOR INSTRUMENT COS., Rochester, N. Y.

338. TEXTILE PRINTING COUNTERS—Catalog No. 75 illustrating and describing Productometer Yardage and Printing Counters.—DURANT MFG. CO., Milwaukee 1, Wis.

CARDING, SPINNING, WINDING . . .

389. THE TRAVELER—Booklet on ring travelers published quarterly with a technical article on spinning and twisting of interest to mill men.—VICTOR RING TRAVELER CO., Providence, R. I.

401. LUMMUS DUSTLESS STEEL BLENDING FEEDERS—Bulletin describing automatically closing, positively locking door on feeders to prevent overloading, choking. — ALDRICH MACHINE WORKS Greenwood, S. C.

402. AUTOMATIC CLEANING AND OVERHEAD HANDLING FOR TEXTILE MILLS—24-page bulletin describing the American Monorail Automatic Cleaner for preventing accumulation of lint on spinning, twisting, winding and warping machines. Also for cleaning monitors and card room ceilings.—THE AMERICAN MONORAIL CO., Cleveland, Ohio.

403. WINDING MACHINES—Principles and Practices—Tuis series available in booklet form for those in the industry who desire copies.—UNIVERSAL WINDING CO., Providence, R. I.

404. LAPLESS ENDLESS SPINNER—Bulletin and full information will be supplied on lapless endless spinner and coning belting.—TOM-TEX CORPORATION, 16 West 61st St., New York, N. Y.

408. CLEANING AND STRIPPING — Bulletin C. S. 100 describes portable and central high vacuum cleaning and stripping equipment for looms, spinning frames, and cards for cotton, synthetic, and woolens.—NEW ENGLAND MACHINE WORKS, 374 East Main St., Waterbury 16, Conn.

409. CARD GRINDING INFORMATION—Outlines care of grinders, instructions on speed to run grinders, amount of oil to add to machine and other pertinent information.—R. S. ROY & SON CO., Worcester, Mass., and Charlotte, N. C.

411. SPINNING MACHINERY—Illustrated folder describing Rieter and Company's precision spinning machinery for cotton, wool, worsted, silk, rayon and blends available upon request.—AMERICAN TEXTILE ENGINEERING, INC., Arlington, N. J.

A NEW

SPRAY-APPLICATION TECHNIQUE

for

TEXTILE PROCESS COMPOUNDS

MINOTINTS

Oil-base fugitive tints for all synthetic and natural fibers.

Identification — Lubrication — Conditioning

RAYON OILS | SS BASE OIL
TINTINOLS • MINEROL
LYNOL | MEON
BRETON OILS FOR WOOL

Accurate trouble-free application of spraying oils and tints by the new pressure method which eliminates pumps and moving parts. Simplification is progress and ours is backed by over 75 years' experience.

INQUIRIES INVITED

BORNE SCRYMSER COMPANY

Offices and Works ELIZABETH, N. J. | Established 1874 | Southern Warehouse CHARLOTTE, N. C.

13,800,000 FEET OF *HOLT* MAPLE FLOORING!

HAVE GONE INTO TEXTILE MILLS THROUGHOUT THE COUNTRY SINCE 1920 —WITH COMPLETE SATISFACTION TO THE MILL OPERATORS.

When you think of floors, remember to specify Holt Flooring, made from Northern Wisconsin, Michigan Hard Maple.

HOLT HARDWOOD COMPANY., OCONTO, WISCONSIN

TON-TEX

QUICK SERVICE

COMPLETE STOCK

UNIFORM QUALITY

For Superior BELTING

- Loom Harness Strapping
- Transmission Belting
- Mechanical Specialties
- Ve-E-zy Segmatic V-Belting
- Lapless Endless, Spinner, & Coner Belts
- Licker-in and Loom Drive Belts

Write for Literature

TON-TEX CORPORATION

16 West 61st Street • New York 23, N. Y.

GREENSBORO, N. C. 217 Jefferson Bldg.

BOSTON 10, MASS. 122 Pearl Street

25 Years Serving Industry

U. S. RING TRAVELERS

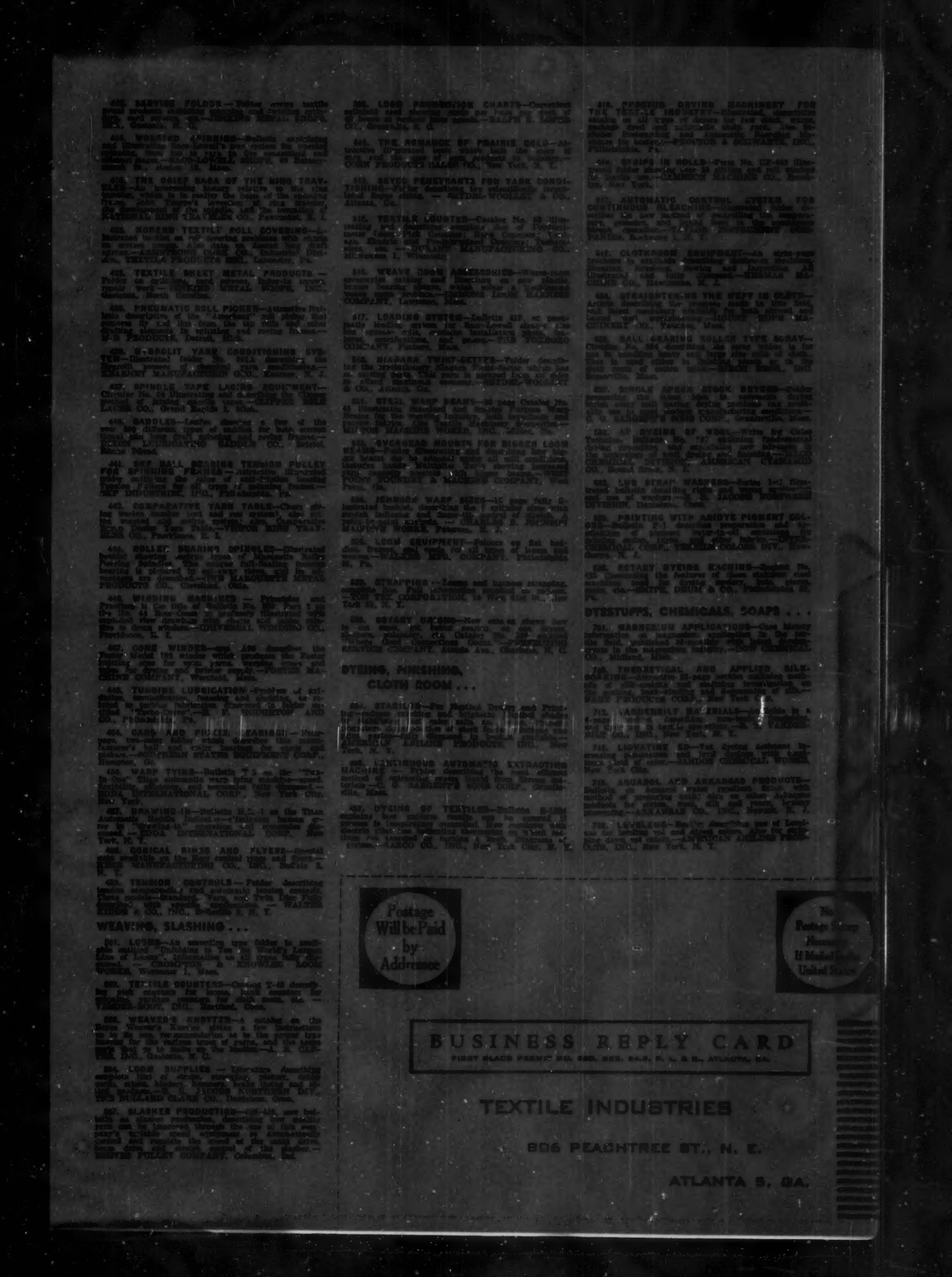
U. S. RING TRAVELER CO.

AMOS M. BOWEN, President & Treasurer

HOME OFFICE & FACTORY: PROVIDENCE, R. I.
SOUTHERN OFFICE & WAREHOUSE: GREENVILLE, S. C.

Write, wire or phone nearest office.

W. P. VAUGHAN, W. H. ROSE—Greenville, S. C.—Box 1048—Phone 3-0915
O. B. LAND—Athens, Ga.—Box 1182—Phone 476
L. H. MELLOR, JR.—Mid-Atlantic States—123 Treaty Rd.—Drexel Hill, Pa.—Phone Hilltop 6-1563
H. R. FISHER—Concord, N. C.—Box 85—Phone 8766
C. W. SMITH, H. J. SMITH—Providence—Box 1187—Gaspee 0100



Postage Will be Paid by Addressee

No Postage Stamp Necessary If Mailed in United States

BUSINESS REPLY CARD

FIRST CLASS PERMIT NO. 000, SEC. 34.9, P. L. & R., ATLANTA, GA.

TEXTILE INDUSTRIES

806 PEACHTREE ST., N. E.

ATLANTA 5, GA.

748. RAPIDASE FOR DESIZING—Bulletin explaining in detail the properties and characteristics of Rapidase.—WALLERSTEIN CO., INC., 180 Madison Avenue, New York 16, N. Y.

749. WATER SOLUBLE GUMS—Booklet giving the origin, gathering, marketing and uses of water soluble gums. This booklet No. 13 is beautifully illustrated and is one of the few treatises on the subject.—JACQUES WOLF & CO., Passaic, N. J.

750. SUPERCLEAR—Leaflet describes this scientific printing thickener which is an ideal thickener for printing all types of textile fibres and fabrics. Noted for its extreme purity, complete solubility and exceptional penetrating properties.—JACQUES WOLF & CO., Passaic, N. J.

756. TEXTILE SPECIALTIES—Listing and describing a wide and complete range of specialties manufactured and sold by American Cyanamid Company formulated to the latest advances in textile chemistry.—AMERICAN CYANAMID COMPANY, 30 Rockefeller Plaza, New York 20, N. Y.

762. ONYX TECHNICAL DATA SHEETS—Two new data sheets describing the use, advantages, and applications of Xyno Resins S 60 and Xyno Resin 3562.—ONYX OIL & CHEMICAL COMPANY, Jersey City 2, N. J.

765. HOSIERY FINISHES AND FORMULAS—Attractive new booklet describing the Amalgamated line of hosiery finishes and giving numerous finishing formulas.—AMALGAMATED CHEMICAL CORPORATION, Philadelphia 34, Pa.

768. DU PONT PEROXIDE BLEACHING SYSTEMS—New book illustrating and describing this continuous peroxide bleach system. Layouts and other information included.—E. I. DU PONT DE NEMOURS & CO., ELECTROCHEMICAL DEPT., Wilmington, Del.

769. SURFACE TENSION DEPRESSANT—The Booklet, "Mercerizing and Alkamerce—The Ideal Dry which can be used as a wetting agent; a dye leveling agent, a penetrant in package dyeing.—HART PRODUCTS CORP., New York, N. Y.

771. "STARCH STABILIZER" — Folder on Vanesta, a product used for textile sizing and printing, discussing stabilization and the results obtained.—R. T. VANDERBILT CO., New York 17, N. Y.

772. TECHNICAL CHEMICAL DATA SHEETS—Complete set for dyeing, printing and finishing operation, showing major operations, performance and advantages.—ONYX OIL & CHEMICAL CO., Jersey City 2, N. J.

776. SERIZYME—Bulletin describing the properties and characteristics of Serizyme, a standardized liquid proteolytic enzyme preparation which can solubilize various types of protein substances.—WALLERSTEIN COMPANY, INC., 180 Madison Avenue, New York 16, N. Y.

777. HOSIERY DYEING—Catalog on hosiery dyeing machinery, skein dyeing machinery, package dyeing, extracting and drying equipment.—SMITH, DRUM AND CO., Philadelphia 32, Pa.

778. DESIZING ENZYME—Data sheet "IPT" describes new stable high temperature desizing agent. Effective on both starch and gelatine sized goods. Being used by the continuous pad-steam method.—ROYCE CHEMICAL COMPANY, Carlton Hill, N. J.

780. HYDROGEN PEROXIDE—Compilation of physical data and properties of hydrogen peroxide. Reaction listed in organic and inorganic chemistry along with applications.—BECCO SALES CORP., Buffalo, N. Y.

KNITTING . . .

801. THE WILDMAN SINGLEHEAD FULL-FASHIONED HOSIERY MACHINE—Literature on request from the WILDMAN MFG. CO., Full-Fashioned Division, Norristown, Pa.

802. THE TUBE-TEX FOR TUBULAR KNIT GOODS—Bulletin describing this modern machine which extracts, processes, dries, conditions and folds in one continuous operation, lowering costs, saving labor, power, space and waste.—H. W. BUTTERWORTH & SONS CO., Philadelphia.

804. STATISTICAL SURVEY—Covering the Full-Fashioned Hosiery Knitting Industry in the United States and Canada.—TEXTILE MACHINE WORKS, Reading, Penn.

806. TEXACO IN THE KNITTING INDUSTRY—Folder on knitting mill lubrication.—THE TEXAS CO., New York, N. Y.

810. ALUMINUM BEAMS—Catalog No. 1-51 describes Hayes magnesium and aluminum specialties for the textile industry. Illustrates this company's beams that are one-third the weight of conventional types.—HAYES INDUSTRIES, INC., Jackson, Mich.

812. CIRCULAR KNITTING MACHINES—Interesting, informative and well illustrated is this six-page folder, just released, which describes this company's small diameter circular knitting machine.—H. BRINTON COMPANY, Philadelphia 34, Pa.

813. THE NEW REINER HIGH SPEED TRICOT MACHINE—168" or 84" knitting width. A richly illustrated catalog describing its many novel features of construction and performance.—ROBERT REINER, INC., Weehawken, N. J.

816. THE NEW REINER KAYLOOM—A combination Knitting Weaving Loom, featured in an illustrated catalog, showing filler attachment and other important points about this machine.—ROBERT REINER, INC., Weehawken, N. J.

817. AUTOMATIC SELECTIVE STRIPPING MACHINE—Descriptive and illustrative folder, entitled "If It's Stripes, Consult Brinton," now available. Important mechanisms involved in the process are described.—H. BRINTON COMPANY, Philadelphia, Pennsylvania.

818. MILTON LIGHT METAL BEAMS FOR EVERY APPLICATION—Catalog 45-A describing Light Metal Tricot Beams made in Standard and Special sizes plus Special Purpose Light Metal Textile Equipment.—MILTON MACHINE WORKS, INC., Milton, Pa.

820. VARIABLE STRIPES AND PLAIDS—Booklet describing Supreme Models SA and ZA-NEW Stripers for knitting plaids, checks, "Scatter" designs and variable stripes.—SUPREME KNITTING MACHINE CO., INC., 165 Johnson Ave., New York.

822. THE KIDDE KNITTER—Bulletin describing the newest in Raschel-type warp knitting machine and higher production attained with it.—KIDDE MANUFACTURING CO., INC., Bloomfield, N. J.

SEWING MACHINES . . .

861. LOCKSTITCH MACHINE WITH AUTOMATIC LUBRICATION—Bulletin illustrating new unit for single needle stitching on wide variety of articles. Form 580.—WILLCOX & GIBBS SEWING MACHINE CO., 314 West 29th St., New York City.

867. "FLATLOCK" MACHINE—Folder No. [illegible] describing, with illustrations, flat seaming operations on knit underwear, lingerie, etc.—WILLCOX & GIBBS SEWING MACHINE CO., New York, N. Y.

[illegible]. THE NEW UNION SPECIAL LOCKSTITCH MACHINE—Information on the new model which cuts production time on sewing operations is contained in Bulletin No. [illegible].—UNION SPECIAL MACHINE CO., Chicago 10, Ill.

MATERIALS HANDLING . . .

1001. HOW TO DETERMINE WHERE OVERHEAD MATERIALS HANDLING EQUIPMENT CAN BE USED PROFITABLY—Profusely illustrated. Gives clear, concise understanding of materials handling. Helps you to determine where and when equipment might be used to speed production and increase profits.—CLEVELAND TRAMRAIL DIV., Wickliffe, Ohio.

1002. CATALOG NO. [illegible]—An attractive illustrated catalog describing in detail the [illegible] shipping containers and the new canvas trucks for textile use.—[illegible], INC., Madison, Ind.

1004. CASTERS AND WHEELS—[illegible] pages, describing casters and wheels suitable for all types of industrial applications. Every mechanical engineer and purchasing agent should have this.—DARNELL CORP., LTD., Long Beach, Calif.

1005. BASKETS, HAMPERS & TRUCKS—This 24-page catalog is profusely illustrated and contains complete description on the Dandux line, especially designed for the textile industry.—C. R. DANIELS, INC., Daniels, Md.

1006. LANE CANVAS BASKETS—16 page illustrated booklet describing the Lane line of canvas baskets for textile use.—W. T. LANE & BROTHERS, Poughkeepsie, N. Y.

1007. OVERHEAD HANDLING EQUIPMENT—56 pages of illustrations showing successful applications of monorail systems to meet every kind of handling problem.—THE AMERICAN MONORAIL CO., Cleveland, Ohio.

1008. CASTERS AND WHEELS—An illustrated booklet with complete specifications showing a complete assortment of Colson Textile Casters.—THE COLSON CORP., Elyria, Ohio.

1009. CANVAS PRODUCTS—A complete listing with illustrations of Dandux Canvas Products. For easy fingertip reference and handy file size. Brief but factual information.—C. R. DANIELS, INC., Daniels, Md.

1010. CONVEYOR KEY BOOK—A guide to production "step-ups" now possible with modern conveying. Shows time-and-effort savings. Well-illustrated with photos showing plant layouts and sketches showing where, how and why different types of conveyors are used for maximum results.—LOGAN COMPANY, INC., Louisville, Ky.

1011. TEXTILE TRUCKS—Booklet describing doff boxes, frames and trucks, yarn, waste, platforms, conditioning, steep lap, fiber, utility trucks, etc. Uses and description.—LOCKE TEXTILE SUPPLY CO., Lincolnton, N. C.

1025. ELECTRIC HOISTS AND CRANES—Booklets describing a complete line of Electric Overhead, Cab and Floor-Operated Traveling Cranes, and a similar complete line of Electric Hoists. All fully discussed with pictures and engineering diagrams.—SHEPARD NILES CRANE & HOIST CORP., Montour Falls, N. Y.

1027. SINGLE-BEAM CRANES—Bulletin No. 120 describing and illustrating the single beam type of overhead traveling crane.—SHEPARD NILES CRANE AND HOIST CORP., Montour Falls, N. Y.

[illegible]. C-D HOLLOW WARE—This [illegible]-page catalog, H-11, profusely illustrated in color, shows Continental-Diamond's line of boxes, trucks, cans, barrels, baskets and trays. Complete description and specifications are given on each item.—CONTINENTAL-DIAMOND FIBRE CO., Newark [illegible], Del.

MISCELLANEOUS . . .

1101. AUTOMATIC BOBBIN REFINISHER—A descriptive bulletin illustrating and describing method of refinishing throwing bobbins on a production schedule.—J. M. NASH COMPANY, [illegible] N. [illegible] St., Milwaukee, Wis.

1102. BALING PRESSES—An illustrated folder describing this manufacturer's complete line of balers for all materials. Both Downstroke and Upstroke models.—ECONOMY BALER CO., Ann Arbor, Mich.

1103. UNBRAKO SCREWS—Illustrated 16-page booklet No. 579 gives data on Unbrako hollow set screws, with knurled point, self-locking features. Includes miscellaneous screw and locking nut data.—STANDARD PRESSED STEEL CO., Jenkintown, Pa.

1104. INTERPRETATION OF ANALYSIS—In compiling this brief collection of terms which most frequently appear in analysis of surface active chemicals, an attempt has been made to explain as clearly as possible the meaning of these terms to those who have had little or no chemical training.—NOPCO CHEMICAL CO., Harrison, N. J.

1107. AUTOMATIC QUILL POLISHER—Bulletin describes production machine for refinishing loom bobbins. Tells how quills can be kept in perfect condition at minimum labor cost.—J. M. NASH CO., 2[illegible] N. 30th Street, Milwaukee 10, Wis.

1108. FABRICATION OF U. S. STAINLESS STEELS—136-page book covering use of stainless steel in textile equipment from welding to cleaning. Includes corrosion-resistance tables for chemicals.—CARNEGIE-ILLINOIS STEEL CORPORATION, Pittsburgh, Penn.

1109. PUMPS—Catalog B-151-1 describes complete line of horizontal and vertical centrifugal pumps for every water handling service.—PEERLESS PUMP DIV., Food Machinery Corp., Los Angeles 31, Calif.

1111. BRUSHES—A 28-page booklet is now available which describes and illustrates this manufacturer's line of brushes for the textile industry.—GASTONIA BRUSH COMPANY, Gastonia, N. C.

1115. TEXTILE WRAPPER—Brochure describing automatic wrapping machine for wrapping various types of textile products. Illustrations of packages and all types of wrapping material.—HAYSSEN MANUFACTURING CO., Sheboygan, Wisconsin.

1117. CUSTOM MADE THREAD GUIDES—Illustrated booklet describing uses and physical properties of the "AlSiMag" line of Thread Guides. Advantages fully discussed with picture and specifications of each type.—AMERICAN LAVA CORP., Chattanooga 5, Tenn.

TEXTILE INDUSTRIES, 806 Peachtree St., N.E., Atlanta 5, Ga.

Please send me, without obligation, free booklets or further information on New Equipment Items described in the January, 1951, issue of TEXTILE INDUSTRIES.

(Fill in here numbers you select from these pages) . . . .

. . . .

. . . .

Name . . . .

Firm Name . . . . Position . . . .

City and State . . . .

Street . . . .

News in Brief

(*Continued from page 94*)

Advisory Committee for National Cotton Council. A 63-man special advisory committee has been appointed to the National Cotton Council. The group has been appointed to serve during the 13th annual meeting of the Cotton Council in Biloxi, Miss., January 22-24 and throughout 1951. Primary purpose of the advisory committee is to obtain the benefit of the experience and judgment of these leaders, some of whom are cotton industry members, according to the Council president.

Campaign for Bag Market. Continuing a two-year campaign to maintain traditional markets for cotton bags, The Cotton Bag Market Committee has announced a $240,000 industry-wide promotion and merchandising program which was launched in January.

Canadian Mills Spend to Remain Efficient. The Canadian primary textile industry has spent during the past five years 165 millions on modernization in an effort to remain technically efficient during a period of intense competition.

Defense Against Fires from Atomic Bombing. When an atomic bomb explodes, the immediate general problem is one of big fires. In Germany and Japan it is estimated that 80% of the total property damage from all bombing was the result of fire. Where damage is small but where many small fires start, plants must be prepared to rely on their own resources, at least for a time, in extinguishing these fires.

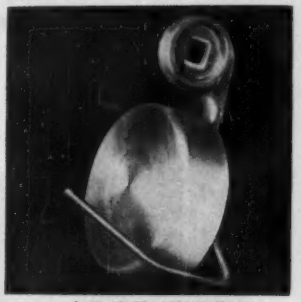
Proctor & Schwartz Movie Productions. In 1950, Proctor & Schwartz produced five sound and color movies of their equipment in operation, and the company is gratified with the reception the pictures have had.

Plenty of Water for Industry. The nation has by no means reached the limit of its water resources, and the potential for public and industrial use is tremendous. The Na-

BALL BEARING TENSION PULLEYS

For All Makes of Twisters and Spinning Frames — Whitin, Saco-Lowell, H & B, Fales & Jenks, etc.

- Guaranteed for TEN YEARS.
- Pre-Greased and Sealed.
- No Time Consumed for Greasing and Oiling.
- Large Diameter Pulley Insures Slower Operating Speeds and Longer Life.



P-122 IDLER ASSEMBLY FOR H & B SPINNING

Call on Lynn Holloway for Any of the Following

HOMCO PRODUCTS

• PULLEY DRIVES • BALL BEARING IDLER PULLEYS
• CYLINDER BEARINGS AND JOURNALS • BALL BEARING JACK STUDS
• SEPARATORS • CHAIN DRIVES
• BALL BEARING APPLICATIONS FOR THE CARD ROOM

HOLLOWAY MANUFACTURING CO.

FA 3416

110 E. TAYLOR — EAST POINT, GA.

DANDUX

DOFF BASKETS

AISLE TRUCKS • DOFF TRUCKS

the very finest . . . for quality . . . for utility

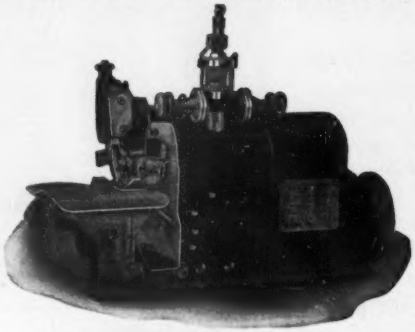
C. R. DANIELS, INC., 121 E. Third St., Charlotte 2, N. C.

Established 1838

TRADE MARK
MERROW

Incorporated 1894

HIGH SPEED OVEREDGING, OVERSEAMING AND HEMMING MACHINES
FOR USE ON
Knitted and Woven Wear of All Kinds



QUALITY RESULTS
HIGH PRODUCTION
CONVENIENT HANDLING
MINIMUM TIME-OUT FOR ADJUSTMENT OR REPAIR
LOW UPKEEP COSTS

For Best Results Use a Machine Suitably Arranged for Your Work

THE MERROW MACHINE COMPANY
2805 LAUREL STREET HARTFORD 6, CONN., U. S. A.
—Distributors—
HOLLISTER-MORELAND CO., P. O. BOX 721, SPARTANBURG, S. C.

HOFMANN

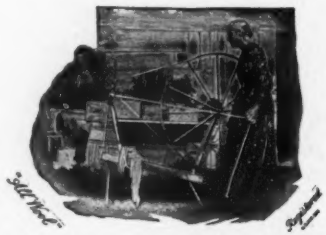
MICRO

OVER 500 MACHINES
NOW OPERATING WITH
HOFMANN
WELT TURNERS

- REDUCED COSTS
- BETTER GRADING
- INCREASED PRODUCTION
- LESS OPERATIONAL FATIGUE

WHY NOT INVESTIGATE?

ALFRED HOFMANN PLANTS
WEST NEW YORK, NEW JERSEY
SUPPLIERS TO THE TEXTILE TRADE FOR OVER 25 YEARS



KNOXALL

ROLLER, SLASHER AND CLEARER CLOTH
ENDLESS BLANKETS RAYON SLASHER JACKETS
ENDLESS REVOLVING CLEARERS

EDWARD H. BEST & CO.

Est. 1888 BOSTON, MASS. Inc. 1901

ATLANTA, GA.
W. C. HAMES
185 Pinecrest Ave., Decatur, Ga.
Dearborn 8974

NEW YORK
H. W. CURTIS
735 W. Crescent Ave., Allendale, N. J.
Allendale 1-3521

GREENVILLE, S. C.
WILLIAM J. MOORE
P. O. Box 1970
Tel. 5-4820

BARNES SERVICE
Consulting Engineers
TO THE TEXTILE INDUSTRY FOR OVER ½ CENTURY
Surveys—Reorganizations—New Plant Developments for Cotton, Wool, and Synthetic Yarn and Cloth Processing, Bleaching, Dyeing, Printing and Finishing.

★ Plant Appraisals ★ Mechanical and Operating Surveys – New Methods ★ Scheduling and Planning ★ Work Load Studies, Job Analysis and Evaluation, with Incentive Plans ★ Standard Cost Installations ★ Cost Control Methods

Laboratory Burden-meter Waste-meter

BARNES TEXTILE ASSOCIATES, Inc.
10 HIGH STREET, BOSTON 10, MASS.
318 MONTGOMERY BLDG., SPARTANBURG, S. C.

Knitting and Warp Yarn
4's to 30's
AVONDALE MILLS
SYLACAUGA, ALABAMA
SALES REPRESENTATIVES
COMER-AVONDALE MILLS, INC.
Boston — Chattanooga — Chicago — Charlotte
New York — Philadelphia — Reading

tional Association of Manufacturers and The Conservation Foundation made a survey of more than 3,000 industrial plants and discovered that less than two per cent of the plants studied account for 30 to 40 per cent of the total water intake.

Textile Wastes Studied. The Industrial Waste Division of the Bureau of Stream Pollution, Pennsylvania Department of Health, has appointed a textile advisory committee to establish standards for textile wastes.

Details of Wool Purchase Program Announced. The types and grades of Australian, New Zealand, South American, and Cape wools, to be purchased as part of the armed services requirements, are available in detail from the Wool Division, Livestock Branch, Production and Marketing Administration, U. S. Department of Agriculture, Washington 25, D. C. Approximately 30 million pounds of raw wool, clean basis, will be procured and must be delivered to the Army base warehouse at Boston.

British Textile Schools. The concensus among British educators, represented by a group which recently toured the United States under auspices of Textile Foundation, Inc., was that their textile diploma awarded for two or three years of textile education is the equivalent of the four-year textile engineering degree granted in the United States. The sentiment was expressed during a general discussion at a special meeting of the American Association of Textile Technologists. In addition, the educators cited the specialized training offered by British textile schools which, in their opinion, is more beneficial than the courses available in American colleges. A leading American educator differed strongly on these points, stating that the best testimonial for the textile graduate of an American school is the superlative condition of the textile industry in this country, and the rapid technological advances here, as compared to those abroad.

Study Negro Employment in South. The policies and practices of both management and labor unions in the employment of Negroes in the South will be the subject of a new study. The investigation, based on case studies in selected southern cities and representative industries in the South, is expected to throw light on long-range efforts to secure more effective use of manpower. The study will be supervised by Calvin B. Hoover, director of research of the Committee of the South and chairman of the Department of Economics, Duke University, Durham, N. C.

Renegotiation of Defense Contracts. The National Planning Association has called on the government to provide a stronger instrument for renegotiation of defense contracts in order to eliminate excessive profits from war production. Renegotiation is the best method yet devised for preventing excessive profits and high costs on defense business without discouraging expansion of production and the efficient use of manpower and material, according to NPA members.

HALLOWELL

Steel Collars

HALLOWELL Steel Collars, functionally proportioned throughout . . . precision-machined so faces run perfectly true . . . beautifully polished all over . . . yet cost less than common cast iron collars. 3" bore and smaller made from Solid Bar Stock. To make sure the collars won't shift on the shaft, they are fitted with the famous UNBRAKO Knurled Point Self-Locking Socket Set Screw—the set screw that won't shake loose when once tightened. HALLOWELL . . . a "buy word" in shaft collars . . . available in a full range of sizes for IMMEDIATE DELIVERY.

Write for name and address of your nearest HALLOWELL and UNBRAKO Industrial Distributors.

—SPS—

STANDARD PRESSED STEEL CO.

JENKINTOWN 34, PENNSYLVANIA

DON'T SHARE PROFITS WITH PESTS

INDUSTRIAL

SANITATION SERVICES

Inspection—Consultation

Maintenance

- Complete Pest Control
- Industrial Fumigation
- Bonded Termite Control

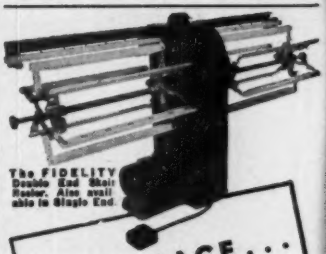
OFFICES IN 20 STATES

ORKIN

EST. 1901

HOME OFFICES: 591 Peachtree, N. E.

Atlanta, Georgia



The FIDELITY Double End Skein Reeler. Also available in Single End.

SAVE SPACE . . . SAVE LABOR

and it's easy to operate

This new FIDELITY Skein Reeler permits each operator to handle four or more machines . . . a control automatically shuts off each machine when the predetermined skein weight has been reached. Machine down time is reduced by from 50 to 90%, and labor efficiency is correspondingly increased. Compact, modern design streamlines your plant and provides the answer to lower manufacturing costs to meet competition.

Write for complete information on how you can cut down time and increase profits.

Manufacturers of intricate precision machinery since 1911.

FIDELITY MACHINE COMPANY INC.

3908 Frankford Ave. • Phila. 24, Pa., U.S.A.

CLASSIFIED ADS

BUSINESS—EMPLOYMENT—EQUIPMENT—PROFESSIONAL CARDS—OPPORTUNITIES

CLASSIFIED RATES

Rates are net, payable in advance each month. Page is 3 columns, 10 inches deep—30 inches to page. Space measured by even inch vertically by 1, 2 or 3 columns in width. Column width 2¼ inches.
Transient rate for display classified, $8.00 per inch.
Contract rate for space within 12 months period as follows:

	Per Inch		Per Inch
12 inches	$7.50	48 inches	$6.75
24 inches	7.25	96 inches	6.50
36 inches	7.00	180 inches	6.00

POSITION WANTED: 10c per word per insertion; minimum charge $2.00. Cash with order. Box Number address care of TEXTILE INDUSTRIES, 806 Peachtree St., N. E., Atlanta 5, Ga., count as eight words. Advertisements for help wanted, equipment for sale, for rent or wanted, and professional cards are accepted at display rates only.

POSITIONS OPEN-MEN WANTED: We can place superintendents and assistant superintendents worsted yarn mills; industrial engineers and time study men; foreman bleacher knitted cotton cloth; chemists and chemical engineers; package dyer; laboratory assistant; salesmen for machinery, dyestuffs, chemicals, oils, soaps and belting; textile school graduates with or without practical mill experience; mechanical, architectural and electrical engineers; jacquard loom fixers; sewing machine fixers; fixer-foreman 86 automatic bobbin changing looms, traveling position.
LIST YOUR CONFIDENTIAL APPLICATION WITH US
We will keep you informed of attractive positions open in the textile mills.
CHARLES P. RAYMOND SERVICE, INC.
294 WASHINGTON STREET Phone: Liberty 2-6547 BOSTON 8, MASS.
SPECIALISTS IN PLACING TEXTILE MILL EXECUTIVES

DYESTUFFS

Will buy your surplus and obsolete dyes and chemicals for cash.

NEW ENGLAND PRODUCTS CO.
91 Oliver St. Boston, Mass.

EATON & BELL

Patent Attorneys
1208 Johnston Bldg.
Charlotte, N. C.
753 Munsey Bldg.
Washington, D. C.

FOR SALE

Practically unused Towmotor, Model LT-44, special built, low lift with side shifter and unloader attachment. Also special forks. Will sell at attractive price. Oconee Clay Products Company, Milledgeville, Ga.

Egan Offers:

COMPLETE SET H&B AMERICAN OPENING ROOM MACHINERY BRAND NEW!

This machinery was ordered by Hong Kong interests but the owners no longer feel it wise to take delivery. It is stored at New York, boxed for export. Consists of:

- 3 H&B #1 Blending Feeders
- 1 H&B Mixing Feed Table, 24" wide, 24' long
- 1 H&B #3 Hopper Bale Opener
- 1 H&B 30" Tandem Cleaning Unit
- 1 H&B Galvanized Iron Mouthpiece
- 1 H&B (5) Sections of English Cleaning Trunking
- 1 H&B #5 Single Cage Condenser
- 1 #7 Exhaust Fan
- 1 H&B Single Process Picker

INCLUDING motors, drives and power transmission equipment.

REMEMBER EGAN WHEN YOU WANT TO BUY OR SELL TEXTILE MACHINERY!

GEORGE W. EGAN
"The Machinery Man Known Everywhere"
239 MAIN ST. WOONSOCKET, R. I.
Phone WOON 3258

PROJECT ENGINEER

Expd. viscose engineer

to supervise design of viscose filament and staple plant.

SOME TRAVEL
$8,000-$10,000
Box TI 1199, 221 W. 41 St.
New York 18, N. Y.

FOR SALE

Two Bros Spreader Type Stokers, practically new. Excellent condition. Oconee Clay Products Co., Milledgeville, Ga.

FOR SALE

One Hoffco-Vac Portable Vacuum cleaning unit with 3-phase, 60-cycle, 220-volt, standard open type motor and starter. Complete attachments. Excellent condition. Oconee Clay Products Company, Milledgeville, Ga.

EGAN OFFERS:

1 Set Riggs-Lombard Cloth Squeeze Rolls, pneumatic type. Rubber rolls 72"x18".

Also have Rubber-Lined Cloth Carbonizing Vat with squeeze rolls similar to above. Located at Hanover, Ill.

GEORGE W. EGAN
"The Machinery Man Known Everywhere"
239 Main St. Phone WOON 3258
WOONSOCKET, R. I.

POSITION WANTED

Position selling yarn. Have had sales experience. Former hosiery superintendent for 20 years. Reply to Box No. 429, TEXTILE INDUSTRIES, 806 Peachtree Street, N. E., Atlanta 5, Ga.

POSITION WANTED

As superintendent or assistant. I.C.S. graduate. Practical mill man, 20 years experience cotton, rayon, plain and fancy weaving. Now employed. Desires change to better location. Would consider overseer weaving. Can furnish good reference as to my experience and qualifications. Reply to Box No. 425, TEXTILE INDUSTRIES, 806 Peachtree St., N. E., Atlanta 5, Ga.

POSITION WANTED

Experienced overseer weaving, dobby or plain work. Experienced on cotton and rayons, white or colored. Can do all planning needed to run weave room, including slashing. References, 18 years experience. Reply to Box No. 426, TEXTILE INDUSTRIES, 806 Peachtree Street, N. E., Atlanta 5, Georgia.

FYANS & LIST OFFER FOR IMMEDIATE DELIVERY

DRAPER MODEL X and XK LOOMS
All Motorized

664—X 42" cloth
98—XK 44" cloth
78—XK 50" cloth
12—XK 54" cloth

DRAPER MODEL E LOOMS
All Motorized

108—44" cloth
125—56" cloth
336—60" cloth

MISCELLANEOUS DRAPER LOOMS

12—Draper Modified D, 68" cloth, motorized
50—Draper Model P, 40" cloth, belt
34—Draper Model L, 48" cloth, belt
2—Draper Model D, 40" cloth, belt
4—Draper Model H, 60" cloth, belt
3—Draper Model D, 58" cloth, belt
4—Draper Model P, 66" cloth, belt
36—Draper E Bag, 21½" cloth, belt
48—Draper Modified D, 74" cloth, motorized

106—C & K TERRY TOWEL LOOMS

26"-36" cloth, all automatic and belt driven, 2x1 and 4x1

C & K W-2 Automatic Looms
24—4x1 96" b.s., age 1936, motorized 550V

C & K S-5 and S-6
All Motorized

73—S-5 Automatic looms, age 1942, 56" b.s.
12—S-6 Looms, brand-new, 56" b.s.

8—Woonsocket 40" Cards
27" doffers, 12" coilers (clothing practically new)

MISCELLANEOUS

50—Stafford Rayon Shuttle Changing Looms—40" cloth, motorized
5—Foster 103 Winders—100 spdls. ea., wooden cones, 2 mtrs.

1—Foster Creel and Entwistle Warper—4 fans, 440 ends
94—Deliveries Saco-Pettee Drawing Frames—4 roll, good condition
56—Whitin D-3 Combers—8 hds. ea., 12" coilers
10—Whitin Ribbon Lappers—10½"-11¾" lap, motorized
10—Whitin Sliver Lappers—20 ends, 9¾" lap, motorized
1—Analytical Scale w/glass enclosure
1—Riggs & Lombard Floatline Tenter and Baking Unit—550/40/3
2—Davis & Furber 72" Double Acting Nappers—24 rolls
1—Roy Napper Grinder
1—Davis and Furber 90" Double Acting Napper—24 rolls
10" Vulcanized fibre roving cans (used)
12" and 14" Vulcanized fibre roving cans (new)
3000—Wooden Cones for No. 44 Winder (cork covered)
1030—12" Pioneer Harness Frames—45½" with heddles (practically new)

All Orders Subject To Prior Sale

Fyans & List Machinery Co., Inc.

P. O. Box 454 • Phone 5-7431, 5-7432
FALL RIVER, MASS.

PLANT ENGINEER

for Southern manufacturing concern operating cotton mill, bleachery, print works and dye plant. Prefer man 30 to 45 years of age with technical college training, one who has had actual experience in engineering phases noted above. Successful candidate must understand how to supervise maintenance personnel for maximum productive results. Plant located in growing metropolitan area. Starting salary commensurate with educational background and experience. Splendid future prospects for man capable of successfully handling this assignment. Replies held strictly confidential. Address full particulars, and enclose snapshot if available, to Box No. 429, TEXTILE INDUSTRIES, 806 Peachtree Street, N. E., Atlanta 5, Ga.

KNITTING MACHINES

NEW — USED — REBUILT

Scott & Williams, Banner, Brinton, Reading, Lieberknecht—all types for full fashioned, seamless and circular mills. A complete line of dyeing and finishing equipment.

MORRIS
SPEIZMAN
COMPANY, INC.

STOCK READY FOR IMMEDIATE DELIVERY

8—40" Kitson Finisher Pickers
10—40" Kitson Breaker Pickers
8—F-5 Type Hoppers, 38½" wide
15—F-2 Kitson Hoppers, 38½" and 34"
2—Lowell Twisters—4" Ga., 3" Ring, 180 spindles
4—#7 Sturtevant Fans, Kitson Condensers #6 and #9

. . . PARTIAL LISTING — LET US KNOW YOUR NEEDS . . .

WILSON LEWITH MACHINERY CORPORATION

Post Office Box 4100 — Warehouse: Wilkinson Blvd.
CHARLOTTE, N. C. — Phone 4-2403 — Behind Barbeque Lodge

RENEW

YOUR SUBSCRIPTION

TO

TEXTILE INDUSTRIES

POSITION WANTED

Are you interested in securing superintendent for medium size weaving or yarn mill. Several years experience as superintendent. Resume to interested parties. Reply to Box No. 427, TEXTILE INDUSTRIES, 806 Peachtree Street, N. E., Atlanta 5, Georgia.

COTTON MILL MANAGER AVAILABLE

Experience includes carded and combed yarns, also fabrics, colored and grey; dyeing and finishing operations. Labor relations, production, quality and cost controls. Reply to Box 428, TEXTILE INDUSTRIES, 806 Peachtree St., N. E., Atlanta, Ga.

QUALITY · DEPENDABILITY · SERVICE

AMERICAN YARNS

For Knitting or Weaving

AMERICAN DURENE

Highest Quality Mercerized Yarn

NATURAL YARNS

Combed Peeler or Sak. 10's—90's Single Combed Peeler or Sak. 10's—100's Ply

Selling Agents for **EFIRD MANUFACTURING COMPANY** Knitting Yarns

Combed, 10's—50's Carded, 8's—30's

THREAD DIVISION · LAWRENCEBURG, KENTUCKY

MOUNT HOLLY, N. C.	CHATTANOOGA, TENN.	PHILADELPHIA, PA.	CHICAGO, ILLINOIS	NEW YORK, N. Y.
Mr. C. E. Wood	Mr. H. W. Davenport	Mr. Wm. S. Montgomery	Wood & Hutchinson	Mr. John Cowan
Miss E. R. Abernathy	628 James Bldg.	3701 N. Broad St.	222 W. Adams St.	Mr. Phelps Ensign
Mr. T. J. Davis		PROVIDENCE, R. I.		Empire State Bldg.
HIGH POINT, N. C., Mr. E. J. Holbrook		Mr. L. T. Howick	GASTONIA, N. C., Mr. T. C. Smotherman	
		527 Industrial Trust Bldg.		

American Yarn & Processing Company

W. R. SUTTENFIELD, Vice-President and Sales Manager

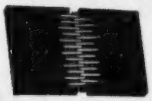
Mount Holly North Carolina

You'll Save 30%* or more by using only GENUINE Clipper Belt Hooks with Modern Clipper Belt Lacers

*TIMKEN ROLLER BEARING CO. AND OTHERS EFFECT THIS SAVING IN BELT LACING COST

In over 30 years experience manufacturing belt lacing equipment *exclusively*, Clipper has developed the world's finest belt hooks. To get the best service from these top quality hooks apply them with a modern belt lacer such as the Clipper No. 9 Portable. This combination will save you money. See your Mill Supply Jobber for demonstration.

No. 9 Portable Lacer



CLIPPER BELT LACER COMPANY, GRAND RAPIDS 2, MICHIGAN

Clipper BELT LACING EQUIPMENT

PENICK & FORD, LTD., INCORPORATED

CORN STARCHES, DEXTRINES, GUMS, CORN SUGARS & SYRUPS

NEW YORK, N. Y. - - - - CEDAR RAPIDS, IOWA

SOUTHERN OFFICES: ATLANTA, GA. - - - - SPARTANBURG, S. C.

John: Why not let the Penick & Ford Textile Laboratory in Atlanta check specifications on that cloth?

Jim

"M-B" BOBBIN CHOKE REMOVER

Blows ALL Fly, Lint and Litter from bobbins by air pressure; eliminates wire or brush hand method; does a cleaner job with speed, as fast as an operator can handle bobbins. Simply place bobbin in head, depress and a gust of air removes all trash in a jiffy. Model A has concaved head for bobbins of ⅞" O.D. or smaller; Model B with convex head for larger bobbins. Attach to bench, wall, post, etc., with screws or bolts. Alloy steel body. Furnished with either ¼" or ⅜" female N.P.T. connections.

Write for Literature.

M·B PRODUCTS

46 Victor Ave. DETROIT 3, MICHIGAN

J. E. SIRRINE CO.

GREENVILLE • SOUTH CAROLINA

Engineers

TEXTILE MILLS • RAYON PLANTS • KNITTING MILLS • DYE HOUSES

BLEACHERIES • STEAM UTILIZATION • STEAM POWER PLANTS

WATER • WASTE DISPOSAL • APPRAISALS • PLANS • REPORTS

Index of ADVERTISERS

A

Abbott Machine Co. ..... *
Advertising Council Inc. 234
Aldrich Machine Works 68
Allen Son's Co., Wm. 238
Allis Co., Louis 166
Allis-Chalmers Mfg. Co..64 and 65
Althouse Chemical Co. 85
Amalgamated Chemical Corp... 74
American Air Filter Co. ..... *
American Aniline Products Inc. 153
American Associated Consultants, Inc. 199
American Cyanamid Co., Industrial Chemical Div. ... 61
American Lava Corp. 83
American Moistening Co. ..... *
American Monorail Co., Inc. .....Front Cover and 138
American Paper Tube Co. 18
American Pulley Co. ..... *
American Steel & Wire Co. ... *
American Textile Engineering. *
American Viscose Corp. 29
American Yarn & Processing Co. 248
Amplex Division (Chrysler Corp.) ..... *
Anemostat Corp. of America... *
Anheuser-Busch, Inc. 215
Arkansas Company, Inc. 19
Armstrong Cork Co. 144
Arnold, Hoffman & Co., Inc...207
Ashworth Bros., Inc. 39
Atkinson, Haserick & Co. ..... *
Atlanta Belting Co. ..... *
Atlantic Steel Co. 223
Atlas Mineral Products Co. ... *
Aurora Pump Co. ..... *
Avondale Mills 244

B

Bachmann Uxbridge Worsted Corp. ..... *
Bagley & Sewall 87
Bahan Textile Mchy. Corp.....182
Bahnson Co. 42
Barber-Colman Co. (Controls). *
Barber-Colman Co. (Textile Div.) 43
Barnes Textile Associates Inc. 244
Becco Sales Corp. 67
Best & Co., Edward H 244
Bijur Lubricating Co. ..... *
Birch Brothers, Inc. ..... *
Bond Co., Charles ..... *
Borne, Scrymser Co. 239
Brinton Co., H. ..... *
Buffalo Electrochemical Co. Inc. 67
Buffalo Forge Co. 6
Buffalo Pumps, Inc. 213
Butterworth & Sons Co., H. W. ..... *

C

Calco Chemical Division ..... *
Cameron Machine Co. ..... *
Carbomatic Corporation 230
Carborundum Co. ..... *
Carnegie-Illinois Steel Corp... *
Carrier Corporation 176
Carter, Inc., A. B. ..... *
Celanese Corp. of America & Subsidiary Cos. 50
Ciba Co., Inc. 189
Classified Ads .....246 and 247
Clayton Co., J. M. 66
Cleveland Tramrail Division... *
Clinton Foods Inc. ..... *
Clipper Belt Lacer Co. 248
Cluett Peabody & Co., Inc. .....76 and 77
Cocker Mach. & Fdry. Co. ... *
Cole Co., R. D. 250
Colorado Fuel & Iron Corp., The, Wickwire Spencer Steel Division 198
Colson Corporation ..... *
Columbia Steel Co. ..... *
Comer Machinery Co. ..... *
Commercial Factors Corp. .....Second Cover
Continental-Diamond Fibre Co.. *
Corn Products Sales Co. 168
Crane Co. 78
Crompton & Knowles Loom Works 58
Crossett Chemical Co. ..... *
Crouse-Hinds Co. ..... *
Curlator Corp. (Textile Corp.) 7
Curtis & Marble Machine Co... *
Cutler-Hammer, Inc. 27

D

Daniels, Inc., C. R. 248
Darnell Corp., Ltd. 218
Dary Ring Traveler Co. ..... *
Dayton Rubber Mfg. Co..96 and 97
Dixie Leather Corp. (affiliate) 45
Dixon Saddle Co. ..... *
Dommerich & Co., L. F. 24
Dow Chemical Co. 150
Draper Corporation 1
Dronsfield Bros. Ltd. 237
Duesberg-Bosson Card Clothing Co. 4
Du Pont de Nemours & Co. Inc., E. I. (Dyestuff Div.)..160
Du Pont de Nemours & Co. Inc., E. I. (Electrochemicals Dept.) ..... *
Du Pont de Nemours & Co. Inc., E. I. (Rayon Div.) .....14 and 15
Dura-Tred 230
Durant Mfg. Co. ..... *

E

Economy Baler Co. ..... *
Edda International Corp. 210
Emery Industries, Inc. ..... *
Emmons Loom Harness Co. ...142
Erie Mfg. Company ..... *
Excel Textile Supply Co. 227

F

Fafnir Bearing Co. ..... *
Fidelity Machine Co. 245
Finnell Systems, Inc. 172
Fletcher Works 44
Formica Co., The ..... *
Foster Machine Co. 26
Foxboro Company ..... *
Frankl Associates, Ernest L....230
Franklin Process Co. 17

CAMS with- Exclusive Features

Sam Cam says:

From PRECISION only—exclusive formula, NON-SLOUGHING Cams (standard or special) for spinning and twisting—at no EXTRA COST—providing amazing, up-to-4 way, yarn control. Get "jewelled movement" ring rail reversing, longer lived accuracy—no sloppy backlash, due to Cams. Build firmer, longer running, higher speed bobbins. Cut your time and costs. No other cams are made with this mathematical accuracy. Write for our Cam Computation Chart and full information, now!

"The Cam House"

- Stock • Special • Duplicated
- Piling Wind (3 and 4 lobe)
- Warp Wind (Combination)
- Wool Spinning

Face hardened Cast Iron or Alloy.

Engineers : Manufacturers — Cams · Bearings · Gears . Chain Drives
DIVISION OF TURNER MANUFACTURING CO.

PC PRECISION GEAR AND MACHINE CO

Ph. 4-6857 2001 North Tryon St, Charlotte, N.C.

THE SOUTH'S LARGEST MANUFACTURER OF GEARS AND CHAIN DRIVES

OVER 500 MILLS COUNT ON

*WAK COUNTERS

★ RUGGED
★ ACCURATE
★ DEPENDABLE
★

We Build to Your Specifications
Hank Clocks
Rotary Counters
Tester Counters
Inspection Counters
Pick Counters
Twister Clocks
Hosiery Counters
Pairing Counters
Yardage Counters
Slasher Counters
Sewing Counters
Special Counters
Reset, Non-reset— Single or Multiple Shaft

Join the hundreds of smart mill operators who count on WAK for greater economy, extra years of service. Investigate the durability features of WAK Counters, and discover for yourself how they cut down repair and replacement costs.

See Our Representative, Or Inquire Direct

WAK INDUSTRIES CHARLOTTE N. C

*T.M. Reg. U. S. Pat. Office

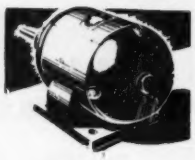
Kettles . . Kiers . . Vats
for

TEXTILE LIQUIDS

• COLE builds vessels to your specifications — dye-vats, kiers, starch-kettles, acid tanks, jib boxes, or other processing vessels for the finishing and dyeing industry . . . in stainless steel, nickel-clad steel, or of standard steel lined with monel metal. Our long experience in the design and fabrication of vessels for the textile industry may be of help to you. Write for latest Cole catalog—"Tank Talk."

R. D. COLE MFG. CO.
NEWNAN, GA. Established 1854

First Step for Quick Repair of Electric Motors



HERE'S how to get your electric motor reconditioning off to a good start:

Disassemble motors. Immerse parts in boiling solution of powerful Oakite detergent. Soak. Rinse.

Low-cost method quickly removes all oil, grease—minimizes brushing. Speeds reconditioning . . . facilitates inspection. Prolongs equipment life.

FREE details yours on request. Write Oakite Products, Inc., 42 Thames St., New York 6, N. Y.

SPECIALIZED INDUSTRIAL CLEANING
OAKITE
MATERIALS • METHODS • SERVICE
Technical Service Representatives in Principal Cities of U. S. & Canada

Seven burner sections mounted on a manifold to make continuous burner 49" in length. Frequently furnished in lengths of 10 to 12 feet and more.

RED-RAY BURNERS

The adaptability of Red-Ray Burners to practically every condition makes them particularly desirable to manufacturers requiring heat in production routines. Red-Ray Burners may be operated in any position, horizontal, vertical, etc. When more than one burner is installed, any or all of the burners may be used or throttled, depending upon heat required for the operation.

Write for Bulletin #18

RED-RAY MANUFACTURING COMPANY, INC.
455 W. 45th Street — New York 19, N. Y.

Peerless genuine
CALFSKIN

THIS IS YOUR IDENTIFYING MARK FOR THE FINEST LEATHER LONG DRAFT APRONS, AND LEATHER ROLLER COVERING IN THE SOUTH

We combine top quality calfskin leather with experienced workmanship to produce Long Draft Aprons, and Roller Covering, which give long and satisfactory service.

Send trial order for Aprons, or box of Rollers—Silver, Lapper, Drawing, Comber Detaching, Draw Box, or Spinning.

Experienced mill men know that leather is the ideal material for long draft aprons, and roller coverings because, first and foremost, it provides *uniform* drafting . . . not affected by temperature changes . . . always pliable . . . no slipping . . . dependable . . . also that any oil dropping on it is *absorbed* and not passed on to the yarn.

PEERLESS ROLLER COVERING SHOP
R. L. Woodard, Owner
438 FRAZIER AVENUE CHATTANOOGA 5, TENNESSEE
Representatives: For Long Draft Aprons
Carolina Supply Co.—Greenville, S. C.

FIT BETTER—WEAR LONGER

Precision-Built Kentex Aprons made to any specifications, on short notice. Write for free samples and prices. We are world's largest manufacturers of genuine leather textile aprons.

TEXTILE APRON COMPANY
EAST POINT, GEORGIA

Hugh Williams & Company, Toronto Canada—Canadian Representative

Index of ADVERTISERS

G

Gardner-Denver Co. 34
Gaston County Dyeing Mach. Co. 25
Gastonia Brush Co. 252
Gastonia Textile Sheet Metal Works ..... *
Gates Rubber Co. ..... *
Gaylord Container Corp. ..... *
Geigy Co., Inc. ..... *
General Dyestuff Corp. ..... *
General Electric Co. ..... *
General Radio Co. 69
Gessner Co., David 194
Girdler Corp. 33
Goodrich Rubber Co., B. F. 5
Goodyear Tire & Rubber Co... *
Graton & Knight Co. 45
Gulf Oil Corp. 37

H

H & B American Machine Co...162
Hansen Mfg. Company 192
Hart Products Corp. ..... *
Hayes Industries, Inc. 60
Hayssen Mfg. Co. ..... *
Herman Machine Co. ..... *
Herr Mfg. Company 21
Hinnekens Machine Co. 190
Hofmann & Co., Inc., Alfred..244
Holloway Mfg. Co. 243
Holt Hardwood Co. 240
Houghton & Co., E. F. ..... *
Howard Bros. Mfg. Co. 48
Hubinger Company ..... *
Hunter Mach. Co., James 12
Hyatt Bearings Div. 46

I

Ideal Mach. Shops 51
Industrial Chemicals Div. 61
Industrial Dryer Corp. 224
Industrialaire Co., Inc. 232
Instrument Development Laboratories, Inc. 136
Interchemical Corp. (Textile Color Div.) ..... *
Iselin & Co., Inc., Wm. 171

J

Jacobs Northern Div., E. H. ..204
Jenkins Metal Shops, Inc. 90
Jenkins Reneedling Co., Inc...252
Jenkins Sons, Inc., M. W. .... *
Johnson Bronze Co. ..... *
Johnson Corp. 73
Johnson Machine Works, Chas. B. ..... *
Jones Motrola Corp. ..... *

K

Kali Mfg. Co. 253
Kearny Mfg. Co. 238
Keefe & Co. 232
Keever Starch Co. 196
Kidde & Co., Inc., Walter .... *
Kidde Mfg. Co. ..... *
Kirkman & Dixon Machine Shop & Foundry 226

L

Lambeth Rope Corp. 236
Lane & Bros., Inc., W. T. 232
Laurel Soap Mfg. Co. 214
Lawlor Co., S. C. 225
Lazenby & Co., F. A. ..... *
Lee Co., L. A. 252
Lestershire Spool & Mfg. Co... 28
Link-Belt Co. ..... *
Livingstone Engr. Co. 238
Logan Company ..... *
Logeman Co., C. W. 220
Loper Co., Ralph E. 252
Logemann Brothers 16
Louden Machinery Co., The .. 81

M

McBride Co., Inc., Edward J. .....Third Cover
Machinecraft, Inc. ..... *
Manton Gaulin Mfg. Co., Inc... *
Maple Flooring Mfrs. Assn.... *
Marquette Metal Products Co.. 88
Marshall & Williams Mfg. Co... *
Mason-Neilan Regulator Co.... *
Masury-Young Co. 184
M-B Products .....245 and 252
Meadows Mfg. Co. ..... *
Meese, Inc. ..... *
Merrow Machine Co. 244
Metal Glass Products Co. ..... *
Miller Motor Co. 59
Milton Machine Works 209
Minneapolis-Honeywell Regulator Co. (Industrial Div.)..178
Moisture Register Co. 222
Monsanto Chemical Co. 79
Monticello Bobbin Co. ..... *
Morningstar Nicol, Inc. 56
Mt. Hope Machinery Co. 198

N

Nash Company, J. M. 196
National Aniline Div. 47
National Ring Traveler Co. ...252
National Tube Co. ..... *
New Departure Div. ..... *
New England Bobbin & Shuttle Co. 202
New England Machine Works. *
New York & New Jersey Lubricant Co. ..... *
Nopco Chemical Co. 20
Norcross Corp. ..... *
North, Inc., Frank G. ..... *

O

Oakite Products, Inc. 250
Onyx Oil & Chemical Co. .... *
Orkin Exterminating Co. 245
Orr Felt & Blanket Co., The ..194

P

Parks-Cramer Co. 195
Paisley Products, Inc. 56
Peerless Pump Division ..... *
Peerless Roller Covering Shop.250
Penick & Ford, Ltd., Inc. 248
Perfecting Service Company... *
Perkins & Sons, Inc., B. F.... *
Pike & Co., E. W. 231
Pneumafil Corporation ..... *
Powell Co., Wm. ..... *
Precision Gear & Mach. Co. ...249
Process Heating Co. 238
Proctor & Gamble Distributing Co. 82

500 pounds of textiles per fighting man

— and no doubt, per WAC, WAVE, and SPAR. That's the amount of textile products of all types estimated as the needs of the fighting forces. Multiply by 3,500,000 and that's our Industry's big job. Let DIAMOND FINISH rings and service help you make ready.

WHITINSVILLE (MASS.) SPINNING RING CO.

Makers of Spinning and Twister Rings since 1873

DIAMOND FINISH

A Knotless, High Tensile, High Speed Machine Sewing Thread

Thomaston PEDIGREE MACHINE THREAD

Available in 10s and 12s in 3, 4, 5, and 6 ply—16s and 20s in 3 and 4 ply. Put up on 2½ lb. or 16½ lb. knotless cones.

A high quality thread for your bag-closing operation. Also particularly adaptable for use in WOOLEN MILLS for tacking thread and COTTON MILLS and BLEACHERIES for seaming thread.

SPECIFY • PEDIGREE

Product of

THOMASTON MILLS

Thomaston, Ga.

"ATLAS" and "CHAMPION"

Medium Grade Knotless Threads also available—in 10s and 12s in 3,4,5 and 6-ply. Both on 2½ lb. Knotless cones.

also manufacturers of numbered duck, cover duck, cover cloth, hose and belt duck, and chafer fabric

THOMASTON Thread

"THERE IS HARDLY ANYTHING IN THE WORLD THAT SOME MAN CANNOT MAKE A LITTLE WORSE AND SELL A LITTLE CHEAPER, AND THE PEOPLE WHO CONSIDER PRICE ONLY ARE THIS MAN'S LAWFUL PREY." (John Ruskin)

There has never been a truer statement

AMERICAN, HICKS, WILSON, WENTWORTH DOUBLE DUTY, GRAVITY

Registered Trade Marks

ETARTNEP FINISH—New Chemical Process

Ring Travelers for Every Spinning and Twisting Purpose

NATIONAL RING TRAVELER CO.

PAWTUCKET, RHODE ISLAND
Philip C. Wentworth, Treas.

CHARLOTTE, NORTH CAROLINA
L. Everett Taylor, Gen. Mgr., Pawtucket, R. I.

SALES ENGINEERS

J. Kenneth Sumner, Charlotte, N. C.
Frank S. Beacham, P. O. Box 251, Honea Path, S. C.
W. Harry King, P. O. Box 272, Atlanta, Ga.

Donald C. Creesh, Charlotte, N. C.
R. C. Munroe, Pawtucket, R. I.
Henry A. Carter, Pawtucket, R. I.

PEGGED *and* GLUED BRISTLES *Stay Put!*

LONGER LIFE—Spiral card brushes, refilled the Gastonia way, last from 10 to 15 years, compared with 2 or 3 years when staples are used—for STAPLES WILL NOT STAY PUT IN SOFT WOOD. Gastonia first dips the bristles and fiber in glue, then they are permanently **pegged** in.

BETTER FINISH—To prevent lint from collecting on rolls, Gastonia paints them with high-grade bobbin enamel, which dries to a hard, glossy finish.

Brushes can be refilled and returned in two days. Freight is paid one way.

JOHN T. HARRELL, MGR. PHONE 5-2422

GASTONIA BRUSH *Co.*

GASTONIA, N. C.

JENKINS RENEEDLING CO., INC.

The Largest Comber Reneedling Plant in the world.

HALF LAPS and TOP COMBS

Reneedled to Factory Specifications

We Use English Made Needles Exclusively

We carry a stock of 50 million needles at all times to insure our customers' combers operating.

GASTONIA, N. C.
Dial 5-0522

Our half laps are guaranteed to gauge uniformly.

An Up-to-Date

PRINTING PLANT

- Equipped with modern machinery and a staff of competent workmen, solicits thru this publication, a trial order on your printing needs.
- We have built a reputation that is known over the entire South by our special attention to the minutest detail.
- We are more than ready to answer any question that relates to your printing problems.

Write us and let us quote you on anything from a postal card to a fully bound book

L. A. Lee Company, Inc.

DALTON, GEORGIA

Printers and Publishers

Industrial Engineers

Specializing in Textiles for over one-third of a century

PAYROLL CONTROLS COST SYSTEMS
SPECIAL REPORTS WORK LOAD STUDIES
COST REDUCTION REPORTS

Ralph E. Loper Co.

GREENVILLE, S. C. FALL RIVER, MASS.

New "M-B" Automatic AIR LINE FILTER

Affords maximum protection from water, dirt, scale, etc., in air line. Protects air-operated controls on Slashers and Humidifiers, Scott & Williams Lint Blowers, Blow-off of the Knotting Device on Barber-Colman Spoolers, Abbott Winders and Blow-off Hoses in Spinning and Weaving Rooms.

Write for Literature.

M·B PRODUCTS
46 Victor Ave.
DETROIT 3, MICHIGAN

Index of ADVERTISERS

Proctor & Schwartz, Inc. .....71 and 72

R

Ragan Ring Co. 250
Red Ray Mfg. Co. 250
Redman Card Clothing Co. ... *
Reeves Pulley Co. .....22 and 23
Reiner, Inc., Robert 32
Rhoads & Sons, J. E. ..... *
Richards-Wilcox Mfg. Co. 174
Ridge Tool Co. 197
Riggs & Lombard, Inc. ..... *
Robbins & Myers, Inc. (Industrial Pump Div.) .... *
Robert & Co. Associates, Inc...254
Rohm & Haas Co. 9
Rose & Co., E. F. ..... *
Ross Engr. Corp., J. O. ..... *
Roy & Son Co., B. S. ..... *
Royce Chemical Co. ..... *

S

Saco-Lowell Shops .....10 and 11
Sandoz Chemical Works 35
Sarco Company, Inc. ..... *
Sargents Sons Corp., C. G..... 98
Scherr Co., Inc., Geo. ..... *
Scholler Bros., Inc. Dura-Bean ..... *
Scholerized Products ..... *
Scott Testers, Inc. 228
Selig Company 225
Seydel-Woolley & Co. 158
Shepard Niles Crane & Hoist Corp. ..... *
Sherwin-Williams Co. 55
Simco Company 216
Sims Company, The ..... *
Sims Metal Works ..... *
Sinclair Refining Co., Inc. .....30 and 31
Sipp-Eastwood Corp. 202
Sirrine & Co., J. E. 248
SKF Industries, Inc. ..... *
Smith & Sons, E. E. 216
Smith, Drum & Company 100
Sonoco Products Co. 92
Southeastern Engineering Co. .....164 and 165
Southern Belting Co. ..... *
Southern Shuttles Div. 200 and 201
Southern Spindle & Flyer Co...208
Southern States Equip. Corp... 52
Staley Mfg. Co., A. E. ..... *
Standard Brands, Inc. 41
Standard Chemical Prod., Inc.. *
Standard-Coosa-Thatcher Co... *
Standard Fabricators, Inc. ...219
Standard Mill Supply 253
Standard Oil Company, Inc.... *
Standard Pressed Steel Co. .....217 and 245
Steel Heddle Mfg. Co..200 and 201
Steele Canvas Basket Co., Inc. *
Stein, Hall & Co. ..... *
Sterling Ring Traveler Co. Inc. ..... *
Stodghill & Company ..... *
Sun Oil Co. 75
Supreme Knitting Machine Co. .....140 and 141
Sylvania Division American Viscose Corp. .... *

T

Taber Instrument Corp. ..... *
Taylor Instrument Cos. 40
Tennant Co., G. H. 211
Tennessee Coal, Iron and Railroad Co. ..... *
Tennessee Corp. ..... *
Terrel Co. ..... *
Texas Co. 2
Textile Apron Co. 250
Textile Banking Co., Inc. 84
Textile Industry 38, 215, 229
Textile Machine Works .....104 and 154
Textile Shield Co., Inc. 233
Textile Shops 156
Thomaston Mills 251
Tidewater Associated Oil Co... *
Toledo Scale Co. 221
Ton-Tex Corp. 240
Torrington Co. .....53 and 54
Treasury Department ..... *
Trico Fuse Mfg. Co. ..... *
Trust Company of Georgia ... *
Turbo Machine Co. 70

U

Union Special Machine Co. ...146
U. S. Bobbin & Shuttle Co.... *
U. S. Ring Traveler Co. 240
U. S. Steel Corp. ..... *
U. S. Textile Mach. Co. 148
Universal Winding Co. 36
Up-Right Scaffolds 186
Uster Corporation 180

V

Vanderbilt Co., Inc., R. T. ... *
Van Vlaanderen Machine Co...102
Veeder Root, Inc.....Fourth Cover
Victor Ring Traveler Co. 62

W

WAK Industries, Inc. 249
Walker Mfg. Co. ..... *
Wallerstein Co., Inc. ..... *
Walton Laboratories, Inc. .... *
Walton & Lonsbury Company..228
Want Ads .....246 and 247
Warner & Swasey Co. 13
Watson-Williams Mfg. Co. ...228
West Point Fdy. & Mach. Co... 8
Westinghouse Electric Corp.... 49
Whitehead Engr. Co. 212
Whitin Machine Works 63
Whitinsville Spinning Ring Co.251
Wicaco Machine Corp. 186
Wickwire Spencer Steel Division of The Colorado Fuel & Iron Corp. 198
Wildman Mfg. Co. 80
Willcox & Gibbs Sewing Machine Co. 57
Wilson Co., Emil V. ..... *
Winsor & Jerauld ..... *
Wolf & Co., Jacques 86
Worthington Pump & Mchy. Corp. ..... *

"Standard" PORTABLE STYLE No. 1530 TAPE SEWING MACHINE

New portable Tape Sewing Machine for sewing Spinning and Twister tapes. Adapted to many other uses. Produces lock stitch and has accurate stitch adjuster. Also has REVERSE MOTION and self-releasing bobbin winder. Hand operated • Compact for small space operation • Adjustable seat • Swivel casters.

For complete details — write for descriptive folder.

STAMICO — SERVICE QUALITY — STANDARD MILL SUPPLY — ESTD. 1890

STANDARD MILL SUPPLY

PAWTUCKET, R. I., 1064-1080 Main Street
NEW YORK, N. Y., 6708 Empire State Bldg.
CHARLOTTE, N. C., 2319 Hutchison Ave.

WATERSHIELD

Water Repellent

P J — one bath

#40 — two bath

•

One of the exclusive textile chemicals developed by Kali to meet today's processing problems efficiently.

WATERSHIELD is easily dispersed in baths at temperatures from 120° F and higher without the bath breaking.

If you are doing or contemplating water repellency on government fabrics — get in touch with us.

KALI MANUFACTURING CO.

Manufacturing Chemists

427 MOYER STREET PHILADELPHIA 25, PA.

Cornelia Plant, Lumite Division, Chicopee Manufacturing Corp.

Alabama Mills
Chicopee Manufacturing Co.
Cluett, Peabody & Co., Inc.
Crompton & Co.
Crystal Springs Bleachery
Davenport Hosiery Mills
Dixie Mercerizing Co.
Goodyear Tire and Rubber Co.
Marshall Field and Company
Mt. Vernon-Woodberry Mills, Inc.
Muscogee Manufacturing Co.
Peerless Woolen Mills
Pepperell Mfg. Co.
Standard Coosa Thatcher
Swift Spinning Mills
The B. F. Goodrich Co.
The Springs Cotton Mills
Thomaston Mills
United Merchants & Manufacturers, Inc.
West Point Manufacturing Company

Ladies' shoes and handbags, suitcases and seat covers are just a few of the hundreds of products now made better, longer-lasting and more attractive with Lumite.

Because this fabulous fabric offers so many amazing advantages — to so many industries, new uses for Lumite woven saran fabrics are being discovered every day.

Since completing the design for the original Lumite plant at Cornelia, Georgia in 1947, Robert and Company Associates have designed and completed one large addition and are currently working on a second. Our diversified experience in a wide range of industries for over 32 years enabled us to supply the advanced thinking and sound engineering skill these unusual projects required.

Whether your expansion plans are complicated or simple, you'll find our staff and facilities capable of carrying your program to a satisfactory and profitable completion.

SYNTHETIC TEXTILE PLANTS

TEXTILE PLANTS

FINISHING PLANTS

AIR CONDITIONING

MODERNIZATION STUDIES

MACHINERY LAYOUTS

POWER AND FILTRATION PLANTS

ROBERT AND COMPANY ASSOCIATES

Architects and Engineers

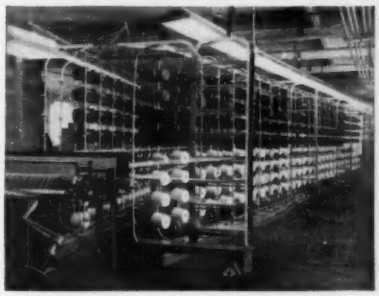
ATLANTA

Mc BRIDE **TEXTILE EQUIPMENT NEWS**

PUBLISHED BY EDWARD J. McBRIDE CO., INC. • 1398 ADAMS AVENUE • PHILADELPHIA 24, PA.

PROMINENT WOOLEN AND WORSTED MANUFACTURER

CUTS WARPING COSTS 30% WITH McBRIDE MAGAZINE CREEL



The new McBride SRM Magazine Creel shown here installed in a leading Pennsylvania woolen manufacturing plant has cut warping costs by 30%, more than doubled warping speeds and solved a number of production problems for the company.

THE OLD METHOD involved the use of small, forty end creels for the transfer of the yarn onto jack-spools. These jack-spools were placed in a creel and reeled onto the beaming frame, then in turn to the loom beam.

This method caused a number of additional problems, including the necessity for frequent end tying requiring time and leaving knots in the warp. The maximum speed obtainable was 80 to 150 yards per minute. Two to three hours were required for set-up of a new pattern – all lost time from a production viewpoint.

The use of different types and sizes of yarn packages was difficult and frequently involved an additional winding operation.

WITH THE NEW McBRIDE MAGAZINE CREEL a full run can be made without the necessity for end tying and with the very minimum of down time.

Speeds of from 250 to 400 yards per minute are regularly obtained and it is the belief of the superintendent that speeds over twice this could be consistently run with lighter yarns.

Pattern changes are now accomplished much more rapidly than formerly. The McBride magazine features permit a complete new pattern to be set up on the creel while the preceding pattern is being run.

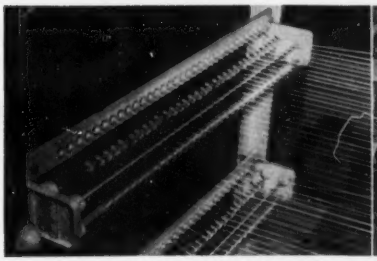
Special revolving spindle helps speed tying of transfer tail to new package.

PROBLEM:

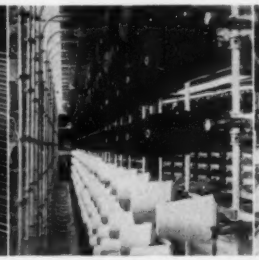
- Cut cost.
- Increase warping speeds.
- Speed pattern changes.
- Eliminate down time.

SOLUTION:

- Warping costs cut 30%.
- Speed more than doubled.
- Pattern changes easier, faster.
- Down time practically eliminated.



1. New improved McBride electromagnetic stop motion stops warper instantly in case of yarn break. The two-way signal lights enclosed in a steel channel for maximum protection speed location of broken ends.



2. Note the adequate ballooning space, giving easy access to packages for the creeler.

3. Every McBride SRM Magazine Creel is engineered to fit the specific requirements of the yarn and the plant's physical layout. Numerous columns would have prevented erection of sufficiently large creel by conventional means.

COMPLETE ENGINEERING SERVICE IS PART OF EVERY McBRIDE INSTALLATION

CREELS *for every purpose,* WARP BEAMS • FLANGES • ROLLS **Mc BRIDE**

You can COUNT on
VEEDER-ROOT
...all through your mill
For looms, frames, or knitting machines . . . for recording picks, cuts, hanks, revolutions, linear units, or whatever *you* want to count . . . there are direct-reading Veeder-Root Counters for the job you need done.
Here are some of the standard Veeder-Root Textile Counters shown in Catalog T-48. And if it takes a *special* counter to fill your bill — then's when it pays to remember that Veeder-Root has the longest engineering experience, plus the most modern plant and resources, to work your problem out most speedily and successfully. Yes, on *any* counting problem, *it pays to count on Veeder-Root.*
In Canada: Veeder-Root of Canada, Ltd., 955 St. James Street, Montreal 3
In Great Britain: Veeder-Root Ltd., Kilspindie Rd., Dundee, Scotland
INCORPORATED
HARTFORD 2, CONNECTICUT • GREENVILLE, SO. CAROLINA